



# Digital Equity Initiative

Integrated Findings

*Durham, NC*

# Introduction

An affiliate of the National Digital Inclusion Alliance, Digital Durham has advocated for digital equity in the Durham community since 2015. Its mission is to create a community where all citizens have the opportunity to be equally engaged through digital access. Recognizing that reliable devices and the internet are modern gatekeepers for obtaining goods, services and education, this evaluation has gathered, compiled and analyzed input from the community through focus groups and an online survey. The goal is to inform the crafting of a digital inclusion plan that works to reduce common barriers to broadband adoption such as cost, access, relevancy, and digital literacy (Huffman, 2020). The COVID-19 crisis has further complicated Durham community digital needs. Participating in the usual tasks of modern life must be done at a distance, and those without internet access or workable devices are held back from communication at best, and potentially exposed to a deadly virus at worst. This digital equity initiative is an ongoing project, and this phase was supported by a grant from BandNC.

In the initial phase, seven focus groups were held to gather opinions and ideas from community leaders and stakeholders about what partners, needs and solutions might be explored. A survey with 20 questions was written by Digital Durham's leadership and distributed by partner organizations via social media and email. Responses were monitored periodically as to the balance of demographic group responses. Adjustments made included the creation of a Spanish version to reach more Hispanic and Latinx community members, a Facebook ad targeted males in Durham, and paper copies were distributed and collected by a volunteer. In this report the Durham community refers to both the city and county of Durham. Where distinctions need to be made regarding the city, county or other areas, it will be indicated.

DIGITAL DURHAM'S VISION: A DURHAM WHERE EVERYONE IS EQUALLY ENGAGED IN THE DIGITAL WORLD

Read more about Digital Durham's other projects at [digitaldurham.net](https://digitaldurham.net).

*"We are in a world that is moving to more digital, whether we want it to or not.*

*And so making sure that everybody has the ability to do it, and not leaving  
people behind is far more important."*

**Participant Quote**

# Executive Summary

Seven focus group sessions were held to gain input from community leaders and members in the Fall of 2020. Many questions emerged from participants as the facilitators asked theirs (only potential partners and needs were coded at a more frequent rate than questions). Also, counting the mentions of potential partners created a lengthy list of Public, Private, Educational and Business groups that might become collaborative partners to solve the problems of digital equity.

Survey participation overall was fairly representative of Durham's population across the board, and there was considerable unity in the responses. According to the United States Census Website, 54% of Durham county residents identify their race as White, 37% Black, and 6% Asian. Identification of Hispanic (as ethnicity) on the census for Durham was 14%. The numbers of respondents for each of the same groups for the Digital Durham survey were: White 38%, Black 39%, Asian 2% and Hispanic/Latinx 21%. (See figure on page 6.)

The numbers of those without internet at all was fairly low (4%) compared to the 14% documented in the 2018 ACS 5 year estimate. Another 7% indicated they had internet only on a phone. This limited access can hamper student completion of assignments, adult access to complex forms for jobs or benefits, and complicate data entry for many aspects of life – even medical care – if it can only be accessed on a tiny screen. Reliable internet access is now a critical need of everyday life not a luxury.

## Focus Groups

The focus groups' conversations returned thousands of words and lots of ideas for aiding digital equity in Durham. The themes that emerged from the text, besides the fact that so many questions were asked by participants, were **potential partners, the pervasiveness of need, and the need for integration and awareness of services**. Many current providers of services (free and paid) were mentioned, as well as organizations that may be useful partners moving forward. The digital divide is a well-documented problem encountered by many Durham city and county residents, and the answers here show that reliable access with dependable devices, along with knowledge of how to use them, are vital for full participation in the Durham community. Needs for access, devices, and training are contextual and diverse. There are organizations with capacity to address any or all of them, and this relates directly to goals two and four on the preliminary Digital Equity Plan.

### Illustrative Quotes

“Durham is a resource rich community and full of people who want to help. People are getting creative...Would someone in the community be willing to give some space to host these training events at different times? This takes a lot of resources but there's probably a way to do it. And in Durham there's resources.”

“If you don't go back to the original issue of access to the internet /Wi Fi, the device didn't do much good. The Chromebooks are great, but they really are built to require internet access. It didn't do many of our students ... good if they didn't have that internet to begin with, and many of them do have their phone as their primary gateway to the internet .”

“And I don't think again, it's a matter of getting every single person trained...a certain portion of the population in Durham needs the training. And then you do a kind of a train the trainer type event so that if I need the training in my household and I get trained, then I go to my house and I teach my mom and I teach my sister and I teach everybody; I don't know that you're able to get 100% of the people that need it to come through a program. But if you can get somebody who can touch those people, I think it's just kind of a...spreading effect. If I know digital literacy, then I'm going to tell somebody about it.”

## Online Survey Open-Ended Questions

The survey invited participants to enter their thoughts on these four questions:

- 1) What needs to be done to increase the number of people that have internet access in their home?
- 2) What resources are needed to ensure everyone in Durham has adequate computing devices?
- 3) How should opportunities to build technology skills be provided?
- 4) How do we ensure everyone in Durham has internet, a device and knows how to use it?

Durham residents, as evidenced by the participation in this survey, were eager to share their thoughts and ideas in response to these open-ended questions. Such questions typically have high response refusal rates in surveys because they take more cognitive effort. The work of Miller and Lambert (2014) showed that non-response rate to open-ended questions can vary from 32% near the beginning of the survey to as high as 76% non-response with open-ended questions at the end of a survey. The Digital Durham survey non-response rates for open-ended questions were 17%, 25%, 22%, and 25% for each question, respectively. These high response rates show earnest interest in the digital equity situation in Durham.

### Sample Open-Ended Answers

#### Question 1 (Internet):

“ I would suggest a program that provides internet service to low-income individuals, in line with a system like food stamps or other government assistance.”

“ Companies need to finish putting lines down, especially in rural communities.”

#### Question 2 (Devices):

“ Community outreach, increased awareness through handouts, bulletins, word-of-mouth, etc.”

“ Subsidizing devices could help, but I also think more computers and devices available to use or borrow from the library would be great.”

#### Question 3 (Training)

“ Create a community computer center which would teach computer skills, both programming and repair, recycle computer systems, provide free/low-cost technical support.”

“Primary language spoken in the home should also be an important factor. For example, having some of these skill building opportunities in Spanish would be incredibly helpful for the local Latinx community.”

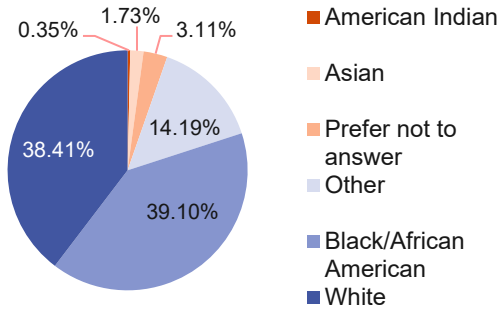
**Question 4 (Skills)**

“(An) holistic overview of who needs what, followed up with waves of technology releases and courses offered to families in need. quality assurance sessions following (months after initial courses) to ensure technology and internet is up to par.”

“ Perhaps working with non-profits that support [residents] new to the area and lower resourced families would help. Also some type of collective or portal where all resources are consolidated.”

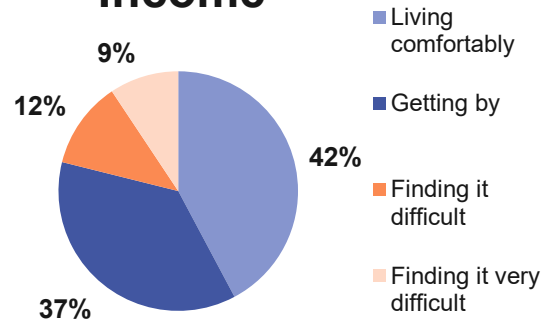
# Survey Results

## Reported Race



Also Hispanic/Latinx 21.11%

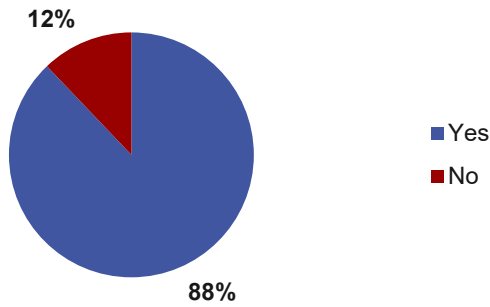
## Income



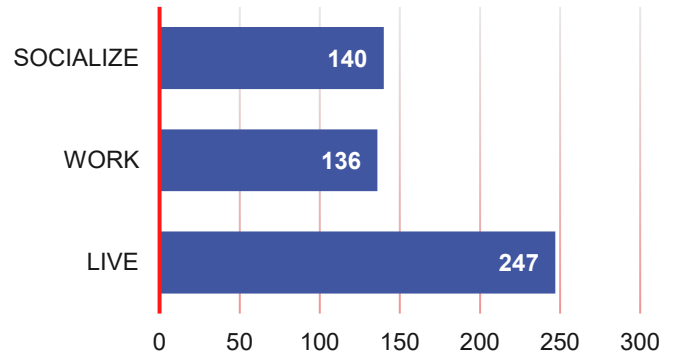
### Participants' Location and Gender

Top Zip Codes	Percentage	Gender	Percentage
27701	28%	Female	72%
27707	18%	Male	24%
27704	12%	Prefer not to say	4%
27713	12%		
27705	12%		
27703	11%		
27712	4%		

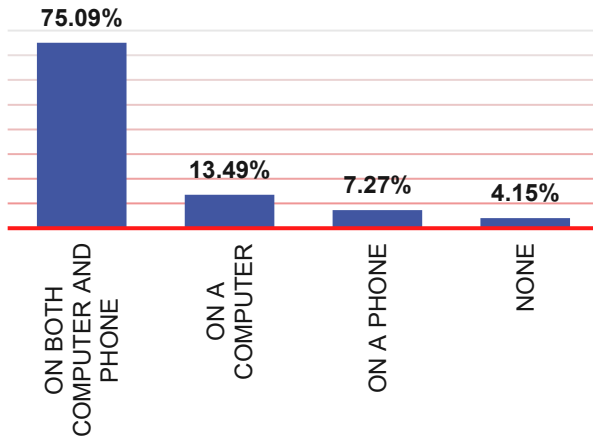
## I have the devices I need.



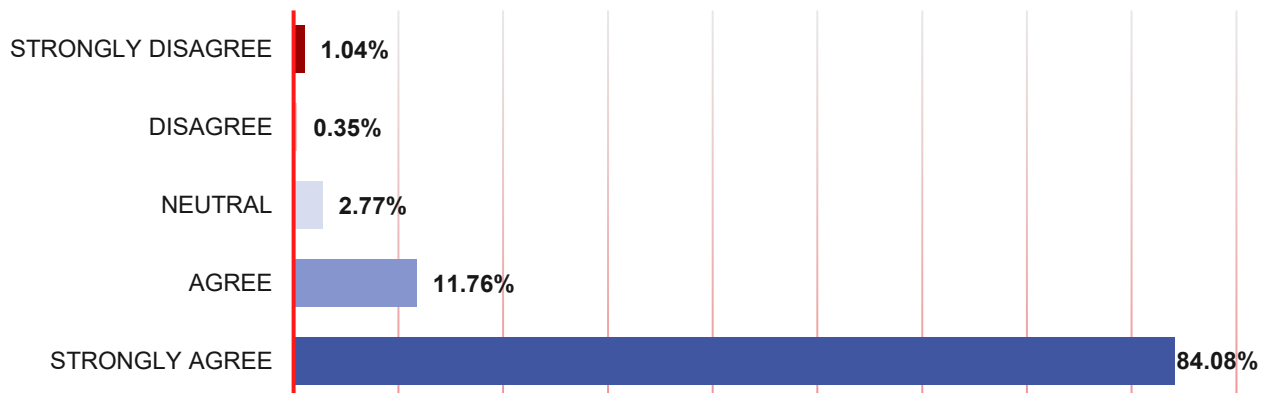
## Connection to Durham



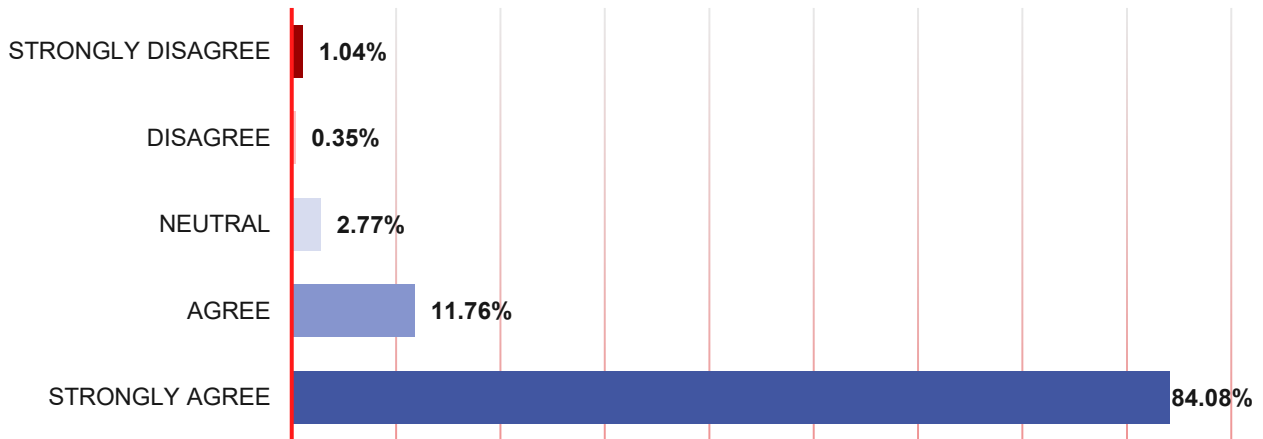
## Internet Access



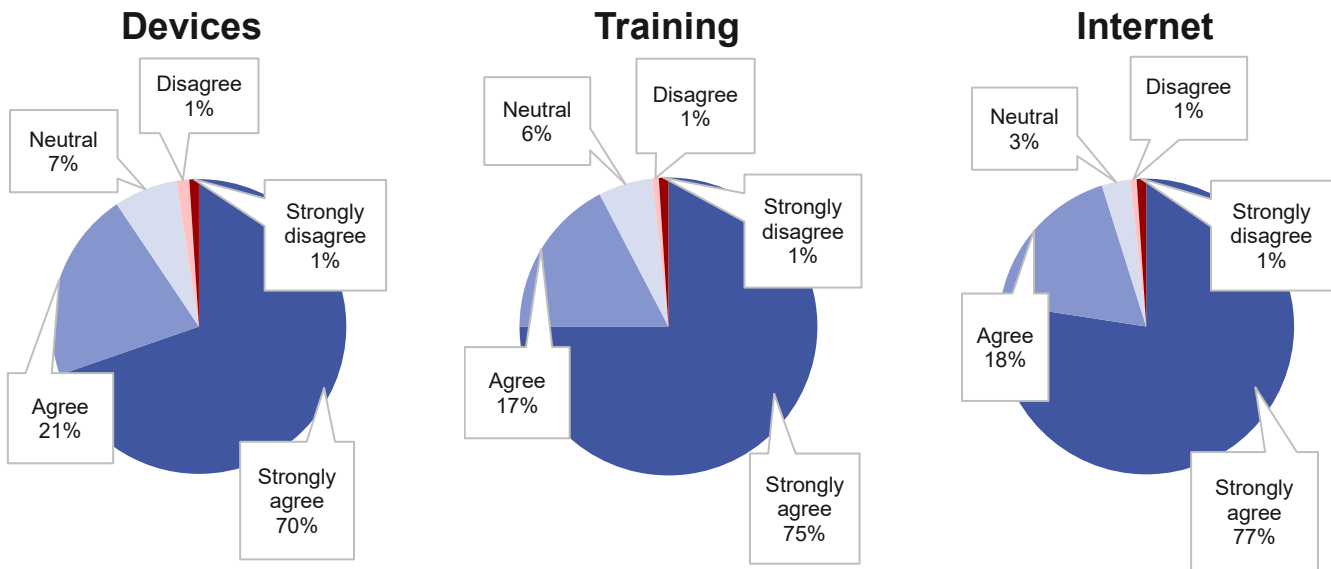
Everyone in Durham should have internet access in their home.



Everyone in Durham should own a computing device that allows them to participate online.



It is important to track Durham’s progress on issues of access to:



*“Go to the houses and see where the problem is to find a way to solve it. Sometimes it is lack of help. People don’t know anything about technology, and they do not know where to seek help.”*

Participant Quote

# Qualitative Data

## Top codes with frequency count

Money/cost (257), Access (230), Potential partners (152), Training (147), Devices (127), Solutions (122)

## Top ten words\*

Focus Groups	Open-ended Answers	Spanish Language
Know	Internet	Access
People	Free	Internet
Think	Access	People
Internet	Community	Free
Need	Classes	Help
Right	Need	Low
Access	Provide	Classes
Want	Training	Provide
Question	Devices	Families
Digital	People	Schools

\*Common articles and utterances (and, the, like, etc.) were excluded from the count.

Similarities in word frequency among qualitative data show unity in community thoughts surrounding providing people access to the internet and training. Notable differences are the appearance of “devices” on the open-ended list and the addition of “families” and “schools” on the Spanish language responses

## High-frequency Code Co-occurrence\*

\*This list only represents a sample of the codes with some of the highest rates of co-occurrence (meaning they were marked for both codes). All sources (focus group transcripts and open-ended answers) are included here.

	Access	Devices	Library	Potential Partners	Solutions	Training
<i>Devices</i>	44	-	6	17	11	17
<i>Money/Cost</i>	71	27	28	3	19	44
<i>Library</i>	36	6	-	31	12	19
<i>Needs</i>	25	18	16	17	14	12
<i>Solutions</i>	28	11	12	27	-	16
<i>Training</i>	45	17	19	13	16	-

Noticing where the codes come together may reveal areas for further attention and evaluation.



## Discussion and Recommendations

Literature and research make clear the connection between digital access and economic exclusion. Those who do not have digital devices, connectivity or the training to use them well can experience economic vulnerability and isolation from opportunity. These, and other dimensions of low-quality jobs and labor market exclusion, influence and reinforce each other (Huffman, 2020). For example, in a report of the impact of neighborhoods on intergenerational mobility (which included the NC cities of Raleigh and Charlotte), Chetty and Hendren (2018) showed that residents for life in certain areas have reduced potential for income if they live there 20+ years compared to living in other urban areas like Fairfax, Virginia or suburban Chicago, Illinois - the two highest urban areas. Those high-opportunity areas have greater access to jobs and training. Jobs and training, in the current economy, are highly dependent on internet access. While a recent positive development in addressing accessibility issues shows a shift from competition to collaboration at the regional level, for more integrated solutions, the private sector will need to take a more robust role. The responses in these focus groups and surveys indicate that community members believe that collaboration locally could bring together fragmented resources to better cover the needs in Durham, thus leading to digital equity.

Reading the responses makes clear the **positive sentiment** about the need for internet access, devices and training for every community member. Responses to open-ended questions were overwhelmingly positive and/or constructive. Negativity bias (those who are unhappy voice their concerns more often) does not appear to be a factor in the data gathered as the survey results show overwhelmingly positive opinions about the survey topics. While there is not a lot of disagreement shown, it is possible that there is some bias in the fact that those who responded are likely those who already support your ideas. Thirteen individuals (out of 289) entered a disagree/strongly disagree at some point in the process (4%). Paying attention to what those individuals are saying and commenting on could benefit any efforts undertaken as to recruit support from reluctant individuals. One such individual commented:

“ Perhaps each household should have a device but not every person and every person certainly is not ‘entitled’ to a device.”

This sort of remark might provide insight on how to approach those who may not initially support an initiative to provide anyone who needs it a device, internet and/or training.

There were many **potential partners** identified. (See the short Qualitative report for the list.) Respondents indicated many potential partners that have the same mission as Digital Durham, or whose stakeholders may benefit the most from Digital Durham’s work. In the survey responses, libraries were often mentioned. The respondents say that Durham may have several pieces of what is needed to alleviate gaps in equity already in place if these pieces can be connected and enlarged. That is, groups donating and distributing devices, and organizations improving and providing broadband, and coordinating training could be brought together to aid citizen access. Both focus groups and survey results suggest Digital Durham could make real progress towards digital equity and inclusion by continuing to work with current partners and expanding to include others.

**Connection and collaboration** will be key moving forward. Current partnerships could be strengthened along with building capacity by reaching out for new partners. Vulnerable groups identified included those whose first language is not English and senior citizens. Some write in answers indicate the school system has solved a device issue by sending them home with students, though this is not an answer to keep all of Durham active online. Multiple family members cannot use one device, sent for K-12 learning, for an entire household's needs, and those without students in their homes are not covered by this at all. Some answers show that there are community members who see school usage as the primary dilemma for the digital divide issue when data shows that the divide reaches further than just formal education activities. Employment potential, job growth, and economic access all hinge on digital access in the 21<sup>st</sup> century.

Many creative ideas for **solutions** presented in the data. One COVID-related suggestion for training was if families came to the virtual meeting, pizza would be sent to their household. If this is not feasible, perhaps a food card (grocery store, restaurant card) could be offered when attendance is complete. Bringing programs to where the people already are (libraries, community centers, Target) came up more than once. By creating centers in areas that people already go, any number of tasks which might be required for participation in society (paying for utilities, obtaining drivers' licenses, telehealth, etc.) could be more conveniently completed. Responses also suggest Digital Durham could identify gatekeepers and lead users to the communities in need and gain access others in need through them by text when possible, but some individuals will literally need to be accessed door-to-door. A loud and clear message that access to the internet should be a public utility and regulated to ensure universal access came through.

The text gathered shows in respondents a critical awareness of the **cost** of bridging the digital divide. The money or cost as part of the issue was mentioned 250+ times in the open-ended answers alone. This is perhaps one of the strongest underlying causes of the inequality between those who have and have not. In addition, funding has been a top recommendation towards solving equity problems (For example, see ["The Homework Gap in North Carolina"](#).) Until digital access is considered a need and not a luxury, businesses will continue to capitalize on what the market as a whole is willing to bear and ignore the margins. As money was not a focus of this investigation, it was not a code until it emerged as a theme in the open-ended answers were coded, and then it gained prominence. In the end cost was second only to access in number of instances.

The participants in this study recognize that **governments** (local, state, and federal) should play a role in helping to solve these issues. They suggest that representatives need to address the administration of programs to regulate and/or provide internet access at a basic level, as well as come up with ways to get usable devices in the hands of those who need them, then train folks. They suggest evaluation as a way to monitor progress, by continuing a dialogue with the people who are receiving the services.

All of the above are directly related to the three common principles shared by the Brookings Institute (Berube, Bosland, Greene & Rush, 2018) which underlie strategies to ensure shared prosperity in cities. Helping all of Durham's citizens equally join the digital world will help continuously create new, high-quality opportunities for workers and businesses in an expanding nation, increase economic mobility for individuals and families while narrowing significant disparities

---

by race, ethnicity, and gender; and finally, build and support communities where all residents can experience a high quality of life and actively participate in charting their local future.

## References

Berube, A., Bosland, J., Greene, S., & Rush, C., (2018) *Building shared prosperity in America's cities*. Brookings Shared Prosperity Partnership. <https://www.brookings.edu/research/building-shared-prosperity-in-americas-cities/>

Chetty, R. & Hendren, N. (2018). The impacts of neighborhoods on intergenerational mobility II: County-level estimates. *The Quarterly Journal of Economics*. 133(3), 1163-1228. <https://doi-org.prox.lib.ncsu.edu/10.1093/qje/qjy006>

Huffman, A. (2020). *The state of digital inclusion in NC and Durham* From a presentation for the Digital Equity in Durham Convening.

Miller, A. L., & Lambert, A.D., (2014). Open-ended survey questions: Item nonresponse nightmare or qualitative data dream? *Survey Practice*, 7 (5). <https://doi.org/10.29115/SP-2014-0024>.

Poncheri, R. M., Lindberg, J. T., Thompson, L. F., & Surface, E. A. (2008). A Comment on employee surveys: Negativity bias in open-ended responses. *Organizational Research Methods*, 11(3), 614–630. <https://doi.org/10.1177/1094428106295504>

© 2021, Digital Durham