Team Troubleshooting

Erin Gitchell Thompson
Team Troubleshooting: A Collaborative Approach to Public Library Tech Support

Library staff often have a wide range of skills, abilities, and comfort levels with technology. Some are terrified of pressing buttons while others feel comfortable pressing buttons they shouldn’t. Some public libraries have actual IT departments, while others have “someone who’s good with computers.” Regardless of the size or scope of IT support, a formal collaborative approach can not only lighten the workload, but it can empower staff and improve moral. This session describes one public library’s experimental solution to IT support.
Who Am I?

Erin Gitchell Thompson, MLIS

Technology Librarian at Cedar Falls Public Library in Cedar Falls, IA since Fall 2017. Prior to that, I’ve worked as a Library Assistant at CFPL and a Library Assistant III at Menomonie Public Library in Menomonie, WI. I have experience in almost every department in a public library for the past seven years.

Important Caveat: I am a librarian first and tech support second. I am currently taking an IT certification class to fill in the gaps of my knowledge.
Agenda

- Background
- What?
- Why?
- Who?
- How?
- What next?
- Questions?
Background

Cedar Falls, IA

- Date of Incorporation: 1854
- Current Population: ~40,000
  - 93.4% White*
  - 2.3% Asian*
  - 2.1% African American*
  - 1.7% from two or more races*
  - 0.7% from other races*
- University Student Population: ~12,000
- Land Area: ~29^2 miles
- Unemployment Rate: ~3%
- Connected to Waterloo, IA
  - Recently named THE worst city in U.S. for Black Americans**

Cedar Falls Public Library (FY2018)

- 32 employees (21.5 FTE)
- 1 FT IT (me)
- Total operating income: $2.73m
- Total volumes: 132,000 items
- Total circulation: 505,000
- 36 public computers, 23 lab laptops, 8 netbooks, 6 OPACs
- 10 hotspots in circulation
- Free public WiFi ~24/7***
- Open 63 hours per week, 7/365

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***Shut off for about 30 minutes every night
What We Already Know

- There is no single, “correct” way to do things
- What works one time might not work the next
- Have you tried turning it off and on again?
WHAT is Team Troubleshooting?

Team: a group of people working together, sometimes with a leader

Troubleshooting: locating problems (in our case, in technology) and fixing them (well, trying to)

Team Troubleshooting: working together to fix technology problems working (almost exclusively) independently to solve technology problems while following group guidelines and utilizing group support if needed, and sharing knowledge with the group
WHY do we want a team?

Teams are fun! make sense.

A team approach ensures that there’s almost always someone in the building with the skills needed to tackle common IT issues, either by themselves OR they’re comfortable and capable of being walked through a process over the phone/ message/ email.

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**Reset Ethernet cable**

Erin Thompson <ethompson@cedarfallslibrary.org>  
Mon, Jul 2, 2018, 9:39 AM

Hi troubleshooters,

I will not be in until after we open today. Can someone reset the Ethernet cable in the server room? Reply if you can.

Thanks!

Dan Meier  
I can do it  
Mon, Jul 2, 2018, 8:55 AM

Erin Thompson <ethompson@cedarfallslibrary.org>  
to Troubleshooter  
Mon, Jul 2, 2018, 9:14 AM

It'll be taken care of. Thanks!!

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WHO should be on the team?

Ideally, if you have multiple departments in your library, someone from each department should be on the team.

Our Team:

- Reference: Marykaye (LA) and Ambri (Librarian)
- Circulation: Dan (LA)
- Teen: Mike (Librarian)
- Youth: Katie (LA)

Degrees and rank don’t really matter in this case (I don’t think they should). What matters is comfort with tech, sense of responsibility, reliability, and accountability. Team size depends on library size.
HOW do we make it ALL happen?

● Foundation:
  ○ Access
  ○ Communication
  ○ Organization
  ○ Familiarity

● Process:
  ○ Initiating Support
  ○ Solving the Issue
  ○ Sharing
I created a single admin login that is shared by the Troubleshooter Team that is separate from my own admin credentials.

- NEVER give ANYBODY your personal passwords!

This also protects against the “hit by a bus” scenario. If I’m suddenly incapacitated for whatever reason, I have a pathway set up for the Troubleshooter Team to get the info they need, when they need it, to reset things and grant access to whoever needs it.
ACCESS, part two:
There are a LOT of keys to the Kingdom...

• Low-level password sheet shared in the team drive:
  ○ Common domain accounts (public PC’s, shared staff stations, etc.)
  ○ Minecraft accounts
  ○ IP addresses for printers etc.
  ○ DeepFreeze login

• Low-level access granted to their library email account:
  ○ Meraki dashboard
  ○ Pharos

• Weigh ease of access against potential for trouble
COMMUNICATION: Keeping in touch with each other

“Hey, uh, did you take care of Dave’s computer?”
“No, I thought you were going to?!?”

The most important thing you have to do to be a successful team is communicate.

What we do: We use “troubleshooterteam@cedarfallslibrary.org” to send an email to all the Troubleshooters. This is a Google group within our domain so there is forum capabilities (but we almost exclusively use email). Every staff member can send an email to the team, and the team can send emails to each other easily.
COMMUNICATION, part two: Options!

Google groups are available to everyone with Gmail

- Free:
  - Spiceworks
  - Facebook messenger
  - Slack (can cost $)
  - Microsoft Teams (Office 365)
  - Trello

- Cost:
  - Basecamp
Even if you have great online communication, it’s still a great idea to get everyone together once a month or so.

Tech support can be stressful, so even if it’s just an opportunity to let off some steam or share some of the more frustrating moments, it can help your team bond.
ORGANIZATION:
Find what you need when you need it

We take full advantage of G Suite! One of the first things I did was create a Team Drive where tutorials, guides, and other important information is accessible to our Team and our Team only.

- Other ways to stay organized:
  - Dropbox ($)
  - Basecamp $$
  - OneDrive ($)
  - Zoho ($)
ORGANIZATION, part two: Standardize your conventions

● Names for equipment
● Processes
● Actions

Your processes (“guides”) should follow library policies. I have made a habit of asking myself “Why is this way?” when examining an existing process to see if it can be more efficient, less confusing, or updated in any way.
ORGANIZATION, part three: What should you share?

- Password sheets / account information they might need
- “Wiki’s” (my how-to guides)
  - i.e: my monthly stats guide
- Notes
- Processes
- Forms you might need
- Screenshots of error messages
FAMILIARITY:
Your team needs to know what’s what!

Not everyone is comfortable with technology, but everyone on your troubleshooting team needs to be if they’re going to be an effective teammate.

- Make sure everyone on the team knows:
  - The major anatomy of the server room / IT structure
  - How the computers are configured
  - Anatomy of all peripherals they could encounter
  - Language you use
FAMILIARITY, part two: The label maker is your friend!

- It’s a great idea to label:
  - Specific cords that may need reseated (especially if they’re in the intimidating server room)
  - Every computer and major piece of equipment in the building
  - Outline processes where appropriate (i.e. steps to reboot complicated equipment, such as an AMH)
INITIATING SUPPORT

Quick! Someone in the library needs help!

You’ve probably had a text or email exchange similar to this at some point if you’ve ever done any kind of tech support. Even though we now know there’s a problem, we are missing some key details:

- When, exactly, the problem occurred
- What, exactly, the problem is
- If the problem is, in fact, still a problem

This is NOT a good way to initiate support.
INITIATING SUPPORT
...the RIGHT way

Make it **EASY** for staff to initiate support:

Place a shortcut to a support request on every desktop and bookmarked on every browser (we use Spiceworks) with an option to email the help ticket to help@cedarfallslibrary.org

Single email to contact the entire support team: troubleshooterteam@cedarfallslibrary.org (yes, it’s long, but they just have to start typing “trouble” and the whole thing pops up! Amazing!)
SOLVING the ISSUE

IT support never really changes

Have you tried turning it off and on again?  Have you tried reconfiguring the primary power coupling?
I don’t expect my team to do everything!

- Troubleshooters typically:
  - Update software
  - Turn off/on/restart equipment
  - Reseat cables
  - Minor research
  - Act as first point of contact

- Troubleshooters will not*:
  - Perform server maintenance
  - Image computers
  - Order equipment
  - Replace equipment components
  - Set up equipment/ add to network etc.
  - Schedule support

*unless, possibly, under direct supervision
SHARING

- If it’s a new issue, it’s a good idea to share how you resolved it with the rest of the team
- If a recurring issue has changed, it’s a good idea to share that with the rest of the team
- If you learn a new trick, it’s a good idea to share that
- Basically: share.
Room for Improvement

There’s ALWAYS room for improvement. Always.

- Staff have a ~75% rating for using our help ticket system
- I don’t promptly close tickets upon resolving them
- Our team doesn’t meet super regularly
- I don’t always update the password sheet promptly
- Several of my how-to guides are incomplete

- Overall, HUGE improvement in how IT support is handled!
QUESTIONS?

Contact me!

ethompson@cedarfallslibrary.org