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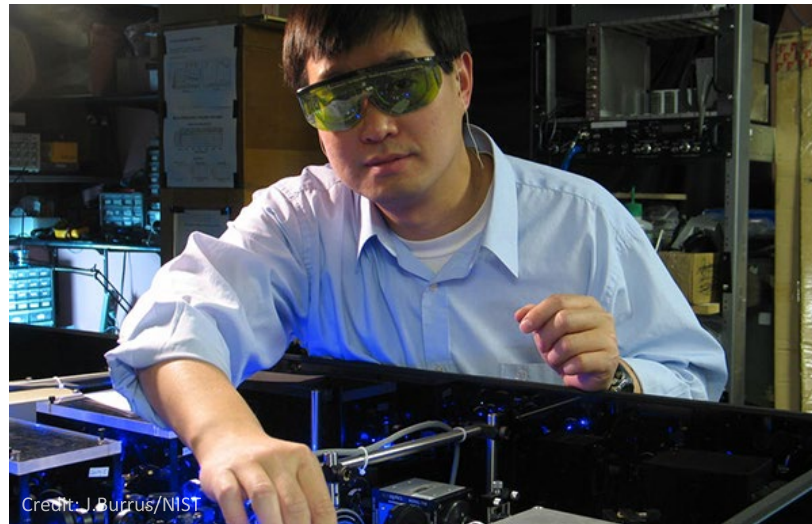
Inclusive Language in NIST Technical Series Publications

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NIST Mission



To promote U.S. innovation and industrial competitiveness by advancing **measurement science, standards, and technology** in ways that enhance economic security and improve our quality of life



NIST Research Library



The National Institute of Standards and Technology (NIST) Research Library supports NIST's information needs with electronic and print resources, research assistance, and publishing support.



Where it started

There is language in technology and standards publications that is exclusionary, biased, and harmful.

Loaded terms: Technology professionals have long used “whitelist” and “blacklist” for certain software rules, along with “master” and “slave” to describe the control relationship between hardware components. The ISPAB plans to formally urge agencies to abandon these and other terms that evoke the legacy of oppression that the Black community has experienced.

In June, against the backdrop of the [Black Lives Matter protests](#), engineers at social media platforms, coding groups and international standards bodies re-examined their code and asked themselves: Was it racist? Some of their databases were called “masters” and were surrounded by “slaves,” which received information from the masters and answered queries on their behalf, preventing them from being overwhelmed. Others used “whitelists” and “blacklists” to filter content.

Microsoft’s [GitHub](#), a popular software-development platform with 50 million users, will replace the word *master* as the default branch name for new repositories, a spokesperson says. GitHub is also making it easy for users to choose their own default branch name when creating a new repository and is releasing guidance to rename existing ones, the spokesperson says. There’s never been a complementary use of *slave* in GitHub’s repository architecture.

Agency to end use of technology terms such as 'master' and 'slave' over racist associations

Technology professionals have long used “whitelist” and “blacklist” for software, and “master” and “slave” for hardware.



The U.S. Department of Commerce's National Institute of Standards and Technology building. | Dana Romanoff/Getty Images

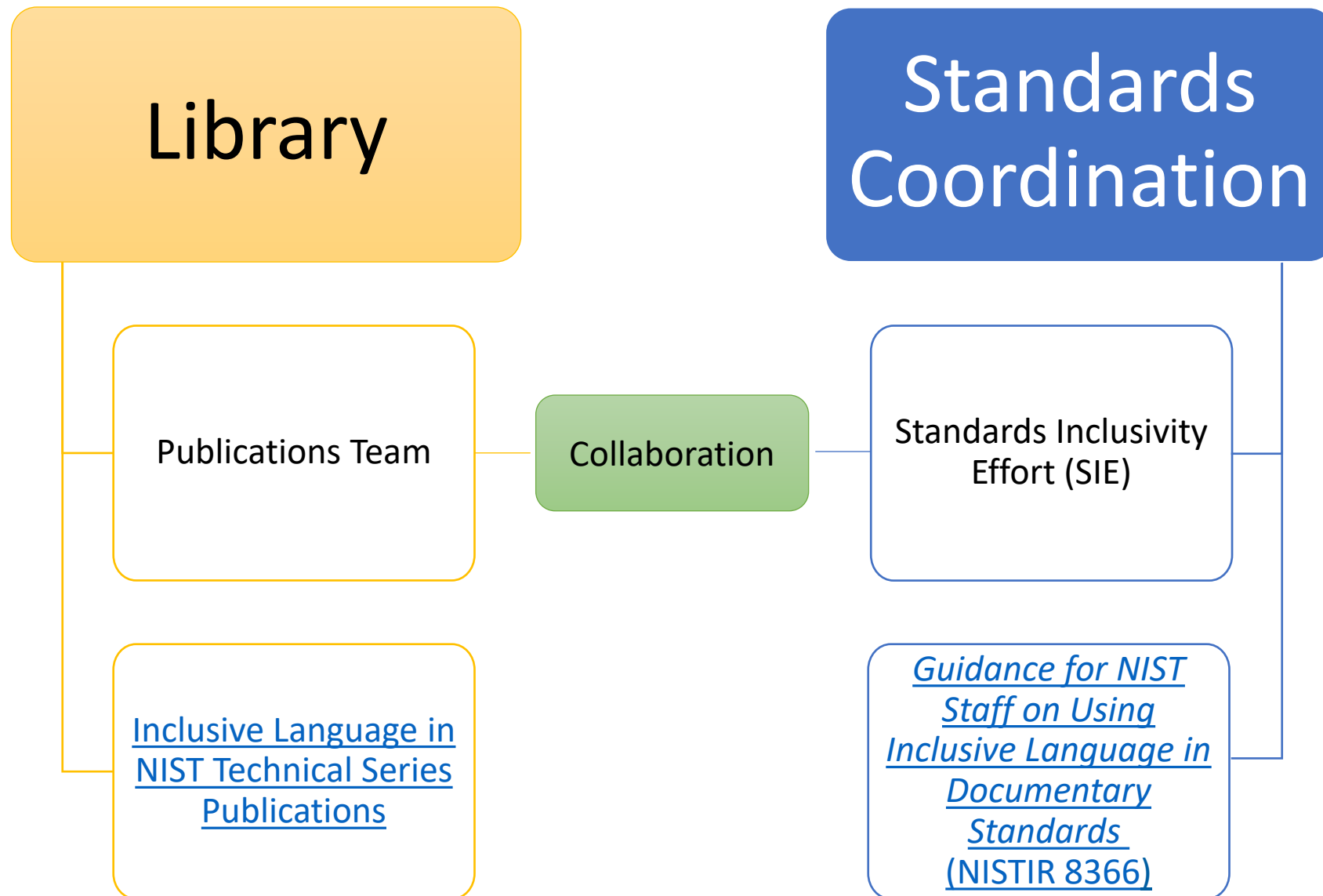
Sources:

[Politico June 2020 article](#)

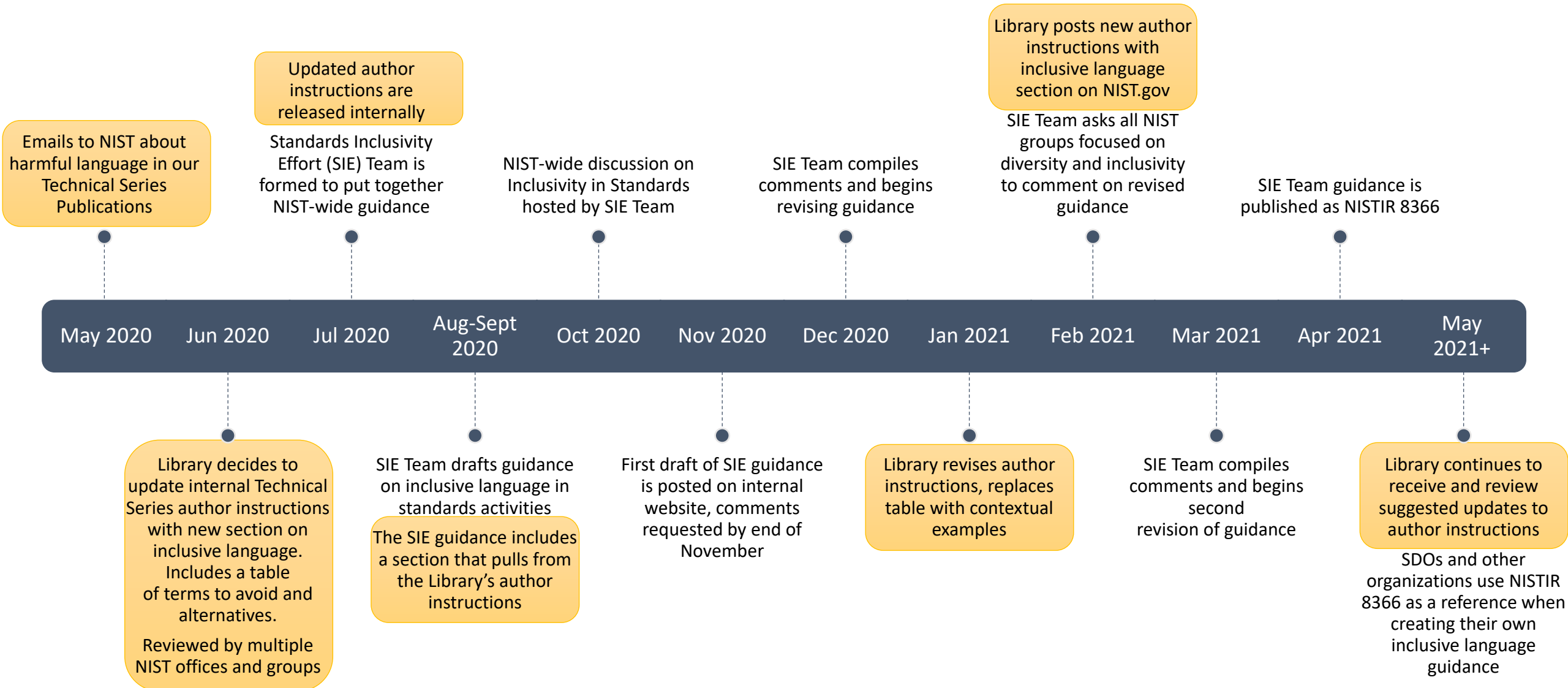
[Wired July 2020 article](#)

[NY Times April 2021 article](#)

How we responded



The process



Important decisions

- Context, context, context
- Plain language
- Focus on intended meaning
- No definitive list of terms to avoid and alternatives

Original	Suggested Edits
Application whitelisting technologies use whitelists to control which applications are permitted to execute on a host.	Application control technologies use allowlists to control which applications are permitted to execute on a host.
We denote the studied wireless network by the black box because the network specifics are not assumed to be available to the proposed test method.	<i>There is no implied negativity or inequity in this sentence. Note: This example may be rewritten using more precise language (e.g., opaque box), as appropriate.</i>
And sometimes we complain that measurement standards work cannot get management attention or that it is too low on the priority totem pole .	And sometimes we complain that measurement standards work cannot get management attention or that it is a low priority .
Another regulator would like a grandfather period of ten years and then a conversion to mass units on dispensers and advertising.	Another regulator would like an exemption period of ten years and then a conversion to mass units on dispensers and advertising.

Lessons learned



Opportunities

Inclusive language is beneficial to everyone

Listening and learning how your language impacts others will create a welcoming space for everyone

Paying close attention to writing and speaking will help create better communicators

Since language is always evolving, recommendations didn't need to be finite; what we publish only reflects current understanding

Challenges

People focus on what words they're not allowed to say/write anymore

Debate over language can feel personal

We had to become amateur linguists as we debated alternatives for words that had been identified as harmful

Words in science and technology publications can have different connotations than in the general vernacular

Library Publishing Forum – Lightning Talk Script

Slide 1: My name is Kathryn Miller and I'm the Publishing Services Librarian at the National Institute of Standards and Technology. I'm here to talk about our process for creating an inclusive language guidance for our publications.

Slide 2: To put this work in context, The NIST mission is to promote U.S. innovation and industrial competitiveness by advancing measurement science, standards, and technology in ways that enhance economic security and improve our quality of life

Slide 3: The NIST Research Library supports NIST's information needs while also serving as publisher of the NIST Technical Series and preserving NIST history.

Slide 4: This effort started with recognition that there is language in technology and standards publications, including ones that NIST publishes, that is exclusionary, biased, and harmful.

Slide 5: The Library collaborated with the Standards Inclusivity Effort, as well as other labs and offices at NIST to respond to this problem. The solution was two-fold: (1) update NIST Technical Series Publications author instructions with new sections on inclusive language and (2) create inclusive language guidance for NIST staff who participate in standards development activities. I'm going to be talking about the author instructions, since this is an audience of publishers, but there was overlap due to the ongoing collaboration between the projects.

Slide 6: This was hard work. Good work, but hard. And it took a long time, from May 2020 to May 2021 up until today. We had multiple, sometimes weekly meetings about inclusivity and inclusive language. We consulted many resources from publishers, industry partners, academia, and other standards developing organizations. We wrote multiple drafts for comment, and spent months going through hundreds of comments, with thorough responses written for each.

Slide 7: The most important decision we made was to shift from a list of words to avoid and preferred alternatives, to contextual examples of how and when to rewrite sentences using inclusive language. Rather than prescribing fixed rules, we wanted to emphasize the importance of writing in plain language, and ask our authors to think about the intended meaning behind colloquial or vague words and phrases.

Slide 8: We learned a lot during this process. While these conversations may be uncomfortable, if they are thoughtful and approached with respect, humility and acceptance---everyone involved will benefit. Additionally, using plain language and paying close attention to the words you choose really does help you become a better communicator. While we found that some do want to be prescribed a list of words they can't use anymore, our Library had to focus on the context of our publications – finding alternatives to harmful language is important, some words in standards and technology publications have different connotations, and alternatives may change the intended meaning.

END: Thank you for joining me in this lightning talk, I look forward to answering any and all of your questions.