



Toshiba e-STUDIO™ Multifunction Products with Re-Rite Enable Greater Independence for Blind and Visually Impaired Employees

IN BRIEF

Problem

For the 12 blind employees of the Minnesota Department of Economic and Employment Development State Services for the Blind (SSB), the everyday process of reading their print mail was not an independent activity. A receptionist would receive the mail, sort out what was important, and read it to the employee. In addition, when quick-turnaround of documents were needed for meetings or other business activities, the SSB's Communications Center, whose job it is to translate for schools, businesses and other state agencies, would not always be able to accommodate at the pace required.

Solution

For blind accessibility, technicians customized a Toshiba e-STUDIO™ multifunction product (MFP) with Braille on the touch-screen. In addition, Re-Rite was installed on SSB's server, allowing the user to scan a document through the Toshiba MFP, turn it into a readable PDF and send to an email inbox. Readable PDF files can then be translated with reading software, so visually impaired employees can now listen to their mail being read independently.

Those who have the ability of sight may not realize it, but memos, advertising, educational materials and other literature are often made available only in print formats. So how do the visually impaired get work in an office environment, when business itself depends on the flow of what is often times printed information?

“There are other programs out there that can turn hard copies into readable PDFs. But we could put Re-Rite on our server, and we didn't have to buy an individual license for each and every staff person. So it saved us a lot of money.”

— Laurie Kalland, facilities coordinator for SSB

In the state of Minnesota, that's part of the function of State Services for the Blind (SSB), a division of the Department of Economic and Employment Development. To help the visually impaired in Minnesota live and work as independently as possible, the division records and broadcasts many current local and national newspapers and magazines each day. They offer employment and career services for the blind and visually impaired, as well as services for seniors who are coping with late onset of low vision.

“Braille users, in order to read, have to touch, but if the touch-screen's too sensitive, it's not going to work for them.” The Toshiba team addressed this challenge with a rather low-tech, simple approach: they placed clear plastic over top of the touch screen to reduce the sensitivity, and labeled the functions with Braille.

— Laurie Kalland, facilities coordinator for SSB

“We do Braille for K-12 in the state of Minnesota,” says Laurie Kalland, facilities coordinator for SSB. “We also do Braille for business, as well as a lot of the state agencies.” To do this, SSB's Communication Center employs Braillists, proof readers and technicians who translate documents into blind-accessible formats.

“It takes time to get Braille produced, even though we're the people who produce it,” says Kalland. “The document is scanned and sent to a program; we use Mega Dots. But after it gets Brailled, a Braillist and a reader have to go through that document to make sure it actually picked everything up.”

The staff of the Minnesota SSB includes 12 blind employees. Email and other electronic documents are readily accessible to them, as well as other visually impaired people, thanks to screen readers and reading software. But print communications—letters, advertising, memos and other business-related documents—can still present a challenge. That's where Toshiba comes in.

In early 2009, Bryan Fritz, national account manager, Toshiba Business Solutions, spoke with Kalland about bringing Toshiba MFPs into SSB. Says Fritz, “We were talking through what kind of solution they would need and how we could upgrade their technology. One of the solutions we discussed was Re-Rite and how it could scan documents from the Toshiba e-STUDIO MFP directly into their email, so they could then use their reading software.” Because Re-Rite can turn any print document into a readable PDF, it seemed like a simple, natural fit.

Fritz introduced the SSB team to Kevin Peters, director for professional services, TBS. “Kevin immediately knew what we needed to do,” says Kalland. “We went there with David Andrews [SSB's Chief Technology Officer] who brought his laptop with all his speech software on it. We sent some documents through the Toshiba device and David was able to quickly access them and have his computer read them aloud.”

With Re-Rite proven successful for this application, TBS loaned the department a Toshiba e-STUDIO 5520c, which features a large, ergonomically-designed user-friendly touch-screen control panel, to test whether the blind employees found it an improvement over previous devices.

“Braille users, in order to read, have to touch,” explains Kalland. “But if the touch-screen's too sensitive, it's not going to work for them.” The Toshiba team addressed this challenge with a rather low-tech, simple approach: they placed clear plastic over top of the touch screen to reduce the sensitivity, and labeled the functions with Braille.

Now, visually-impaired employees can scan a printed document, turn it into a readable PDF, and send it to their own email inbox where their reading software can then communicate the content audibly.

The system works especially well at the quick pace of day-to-day business, when there isn't any time to send a document through the very busy Communications Center. “For example, say you're walking into a meeting and you get something at the last minute that needs to go to everybody in that meeting, and one of the people in the meeting is blind,” says Kalland. “In our office we've always had a rule that you can't distribute anything unless you have it done in Braille or something that's accessible for the blind. Re-Rite has allowed us to take the document and email it to them, so they have immediate access along with everyone else.”

“There are other programs out there that can do the same thing,” says Kalland of Re-Rite's ability to turn hard copies into readable PDFs. “But we could put Re-Rite on our server, and we didn't have to buy an individual license for each and every staff person. So it saved us a lot of money.”

And with a little innovative customization, Toshiba has delivered on SSB's commitment to help the blind and visually impaired “to live and work as independently as possible.”

