Like so many things in this fast-paced world, staffing solutions are evolving at remarkable speed. While this may not be at the top of your priority list, the implications most likely are. Long-time promises of operational efficiency, workforce utilization optimization, eliminating overtime, and staff engagement are more real than ever. When combined with the benefits of new technologies that offer new levels of adaptability, affordability, and importantly for success, simplicity – switching from paper or older technologies – has never made more sense.

The acceleration of value to organizations is, in large part, a convergence of many factors. To understand the changes that are making a big difference, let’s look across the different aspects of staffing software solutions, broken down into the simplest of terms. As you take in this world of changing technology solutions, watch for the similarities to the nursing process. You will likely see signs of influence in several areas where there has been significant gain in effectiveness and outcomes.

Executive Summary

- Staffing solutions are evolving at remarkable speed.
- It no longer takes large, complicated, technical teams to create powerful, reliable, high-quality solutions.
- Today’s cloud-based solutions can be implemented in hours and configured as fast as an organization can tolerate.
- These new, well-designed systems are highly intuitive and adopted rapidly.
- Data can be displayed in different ways for different users with different responsibilities.
- Upgrades are no longer big, costly events; they are done automatically.
- Large outlays for licensing fees and big start-up costs are also things of the past.

To keep is simple, let’s look at this from six angles, all of which are interconnected in bringing about many positive changes.

- Creating
- Implementing
- Adopting
- Leveraging
- Maintaining
- Affording

Creating

Building software solutions today is nothing like it was 10 years ago. There is plenty of really good news on this front. At the most fundamental level, it no longer takes large, complicated, technical teams to create powerful, reliable, high-quality solutions. When using the latest technologies and principles, the speed in moving from identification of a need to a fully realized, tested, and usable feature set that addresses that need, has increased exponentially. Here are some reasons why and concepts you should consider when searching for a solution.

Agile software development. This new(ish) way of developing has replaced traditional approaches in creating software. It is described in Wikipedia (2016a) as “a set of principles for software development…that promotes adaptive planning, evolutionary development, early delivery, and continuous improvement, and it encourages rapid and flexible response to change” (para. 1). Hmm. One cannot help but wonder if a nurse was involved in introducing this concept to the engineering world.

The Cloud. Cloud computing has “become a highly demanded service or utility due to the advantages of increased computing power, cheap cost of services, high performance, scalability, accessibility as well as availability” (Wikipedia, 2016b, para. 3). Among its many benefits, like mobile access, the cloud has transformed how software is delivered and maintained, removing the high cost of managing software internally for organizations. With this shift in responsibilities, large organizations can reallocate technical resources and small organizations that previously could not afford the infrastructure needed to manage software can put that barrier to rest.

User-centric design. When applied correctly, user-centric design brings adoption and usability of software to new levels of effectiveness. In the past, we thought about user needs in terms of features and functions, but not so any more. With user-centric design we dive deep into understanding how a particular user

KATHY S. DOUGLAS, MPH-HA, RN, is Chief Clinical Officer, ShiftHound, San Diego, CA; and Creator of the film NURSES: If Florence Could See Us Now.
thinks and we surface data and features into the natural flow of how work is done. This approach to design fundamentals can be found in the intuitive nature of modern solutions that minimize or eliminate the need for training and increase the speed of adoption.

Responsive Web design. Another factor in the power of new technologies is responsive design. Some really smart people figured out how to optimize the user experience across different devices from mobile, to tablets, to desktop computers. Responsive design eliminates the need to create separate products for the many different-sized devices in common use today (Wikipedia, 2016c).

Less is more. The old adage “less is more” applies in many ways to what has changed. For example, the size of a screen on a mobile phone forces a deep understanding of what is needed, when, and when it is not. This has had significant influence on what could almost be called the simplification revolution. But the less is more concept goes beyond design. Another factor influencing the speed of responsiveness to user requirements and the affordability of these new solutions is the fact that it no longer takes huge development teams to create software. Today’s technology advances and development practices have changed all that. Don’t be fooled or concerned by small development teams in your search for the right solution for your organization. There are many advantages to small, powerful teams.

Implementing

The days of spending months preparing software for use are over. Today’s fully cloud-based solutions can be implemented in hours and configured as fast as an organization can tolerate. Remote implementations are becoming popular as organizations start to understand the realities of simple, smart, cloud-based solutions. Since there are no hardware technology decisions or requirements on the side of the organization, time is spent making configuration decisions that setup the system for the unique needs of each department or area. In the past, system set up and configuration took months. Now it can be done in days or weeks. If integration to other systems is desired, with modern approaches to data transfer, interfacing is also fast, easy, and significantly less expensive than in the past.

Adopting

Simplifying and optimizing the user experience has had a powerful impact on adoption, which is fundamental to getting the most out of automated staffing. These new, well-designed systems are highly intuitive and adopted rapidly. No more pulling staff off duty to sit in training sessions. Staff not only require no training, they quickly come to embrace the benefits of having their schedule on their phones, enjoy picking up or turning down shifts via text or email, and they do not miss the constant back and forth of phone calls asking them to work.

Managers and administrators can be trained in hours, not days. They can be as mobile as their jobs demand, making communication and getting work done highly efficient. Hours spent on the phone trying to fill shifts are replaced by intelligent and collaborative approaches to staffing where needs are communicated instantly to qualified staff via text or email message. The result is not only more shifts filled but healthier staff/manager relationships. Decisions can be made on the run, with instant access to key information like seniority, overtime status, and date last called in/off. Evidence-based staffing decisions become a natural part of the staffing process with real-time data needed to inform effective decisions displayed right where decisions are made.

Leveraging

Among the many benefits of automation and widespread adoption is the collection of data and the many ways it can be used to continually improve performance. These data are used to make well-informed decisions, get a heads up of options to avoid overtime, or analyze patterns to see opportunities to address issues or fine-tune processes. Data can be used to understand performance at the level of an individual, unit, department, facility, or enterprise. Data can be displayed in different ways for different users with different responsibilities. For example, a house supervisor has very different needs than a department head or a charge nurse. The most sophisticated systems will allow for sharing data across solutions. For example, if someone has a license that has expired, that information should be clear when making a staffing decision. To take that example a step further, a staff member should be alerted his or her license is about to or has expired. The whole point is that once you have data – use it!

Maintaining

Maintenance is secured with new cloud-based solutions. This eliminates the need for hiring to maintain software and brings independence from the information technology resources that older systems require. Upgrades are no longer big, costly events; they are done automatically. These new software delivery models make it easy to update and improve with new features and functionalities released regularly. You only need to turn them on and try them out. There is a lot of freedom associated with this model. Now individual units are as empowered to implement new software tools as are departments, facilities, or entire integrated delivery systems. This is not just true from a technical perspective, but also a pricing model perspective (see Affording).
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**Affording**

Large outlays for licensing fees and big start-up costs are, you guessed it, also things of the past. In an environment where cost cutting and high performance are merged expectations, this is really good news. Newer pricing models, based on per user, per month, are designed to fit easily into operating budgets. Many are all inclusive: software license, setup, training, upgrades, and ongoing support. This structure eliminates implementation and training costs, service fees, maintenance fees, upgrade costs, and other nasty hidden costs that surface unexpectedly and are not included in the budget.

**Summary**

While health care staffing will always be complex – that is the nature of the beast – we have come a long way in making tools that support easier, smarter, and more affordable staffing. $

**REFERENCES**

