



# Latest Trends in IT & Engineering Staffing and Solutions

IT & Engineering Services Update

## Talent Acquisition Technologies Go Mainstream

While its not the same as the movie "Moneyball," in which Oakland A's manager Billy Beane uses data instead of gut intuition to build a winning baseball team, talent acquisition technologies, or TAT, has arrived for the IT and engineering staffing industry. And it looks to be a game-changer.

What are the new platforms? TAT is still developing across a wide range of startups, but a common element is data analytics culled from existing social networks and other online sources. One type of TAT takes data and using matching technologies produces tracking and performance metrics to streamline the recruiting process.

The new technologies are likely to be appealing to both firms and the talent they are recruiting. Staffing firms like the cost-efficiencies of more quickly locating new hires and thereby reducing advertising costs. Consultants, in turn, will not have to go through as many interviews. For both parties, it means cutting to the chase – by getting to work more quickly.

Take online advertising, for example. Many staffing firms rely heavily on various companies like CareerBuilder, Monster, Dice, Indeed, and LinkedIn, to locate talent. The metrics available today allow recruiters to see which online sites are leading the pack whether its eyeballs or hiring metrics. A firm can also drill down into the advertising data to find, say, how many Java developer jobs are on Indeed in the state of Georgia.

Firms, in turn, can measure recruiter productivity and placement rates for hires month by month, by staff person, and compare to appropriate benchmarks. Just as importantly, the firm can begin to measure cost per job placement, and even set a "stop-spending rule" once the firm has what it believes is a sufficient pool of candidates.

And while staffing firms do not have the same detailed metrics on candidates as Billy Beane had for baseball players, that is likely to change in the future.

Of course, this means consultants looking for jobs may see an accelerated hiring process. For starters, with new cost-

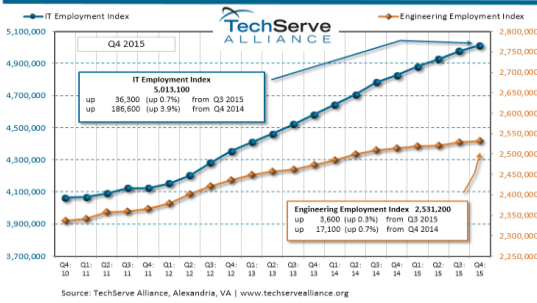
efficiencies in advertising, job postings may not be up for as long as they were previously.

Technology has the potential to streamline the interview process where scheduling follow-up interviews can cause significant delays. For example, with the new data-driven telephone interview platforms, candidates may only have to go through a single screening interview before the final on-site interview. The initial screening could be performed by a junior recruiter who relies on a bank of questions -- including technical ones -- that can then be moved into the staffing firm's Applicant Tracking System or CRM for review by others.

After the interview is recorded, recruiters can slice and dice the telephone interview into a series of 3-4 minute audio clips comprising key questions and responses. Not only does this save time for everyone involved in the review process – including potential clients – it helps the recruiting team get a sense of the candidate's personality and communication style.

In summary, recruiting in IT and engineering is likely going to become more streamlined in the near future. Technology driven processes should help showcase candidate skills in a more organized way for decision makers. And at the end of the day, the talent pool should get to work much more quickly.

## IT Jobs Grow in Q2; Engineering Job Growth Remains Anemic



In Q2, the number of IT jobs continued to grow at a consistent but modest pace, adding 39,200 (up 0.8%) for the quarter. Although engineering employment was positive, growth remained anemic increasing by only 1400 jobs (up 0.2 %) during the second quarter.

## Lower Housing Costs Lure IT Talent to Smaller Cities

While smaller cities still find it hard to compete with the major IT markets, thanks to the lure of cheaper housing costs and an abundance of tech jobs, the momentum may be shifting. San Francisco, Washington, D.C. and Seattle are still dominant in terms of depth and breadth of talent and jobs, according to CBRE Research's "Tech Talent Scorecard" for 2016. New York and Austin round out the top five spots.

Based on 13 factors, the CBRE report ranks the top 50 U.S. and Canadian technology markets by "their ability to attract and grow tech talent." Rankings are based on various data including tech talent supply, prospects for growth, concentration of tech talent, level of education, industry outlook for job growth, and market outlook for office and housing costs.

When looking at growth rates of tech talent in various cities for the last five years, smaller markets dominated the list of top "momentum markets." Charlotte, NC, with a 74.7 percent growth rate, followed by Nashville at 67.9 percent top the list. Also included among the top 10 momentum markets were Oklahoma City and Phoenix along with coastal areas such as the San Francisco Bay area, Baltimore and Seattle.

One of the factors driving growth in the smaller momentum markets is a lower cost of living. With 36 of the top 50 tech talent markets having a cost of living above the U.S. national average, those markets that are below national average have an advantage.

To assess affordability, the CBRE report compared the average apartment rent to the average salary of a tech worker using a benchmark of 30 percent of income for housing needs. Based on that benchmark, top momentum markets like Charlotte (#1), Nashville (2#) and Oklahoma City (#5) were clearly appealing to tech workers, and especially millennials with apartment rent-to-earnings ratios of 13, 17 and 12 percent, respectively.

Compare those affordability ratios to a place like New York. While New York produced the most tech grads, its rent-to-earnings ratio was 33.2 percent. In other words, an IT professional could lower his housing costs by 2/3 by choosing to live in Charlotte rather than New York---an appealing proposition for many.

## Unemployment Rates Remain Low in Q2 for High Demand Technical Skill Sets

The unemployment rate for most IT skill sets is below the unemployment rate of the overall workforce; the unemployment rate for engineering occupations is more of a mixed picture. (see chart below)

IT Occupations (Q2 2016)	
Computer and information systems managers	2.2%
Computer hardware engineers	--
Computer and information research scientists	--
Computer network architects	1.1
Computer occupations, all other	3.6
Computer programmers	3.7
Computer support specialists	1.2
Computer systems analysts	2.4
Database administrators	6.4
Information security analysts	1.7
Network and computer systems administrators	0.6
Software developers, applications and systems software	1.0
Web developers	4.7
Engineering Occupations (Q2 2016)	
Aerospace engineers	5.1
Architectural and engineering managers	5.3
Biomedical engineers	--
Chemical engineers	7.7
Civil engineers	2.6
Electrical and electronic engineers	1.1
Industrial engineers, including health and safety	0.4
Materials engineers	6.0
Mechanical engineers	0.8
Mining and geological engineers, including mining safety engineers	1.6
Nuclear engineers	--
Petroleum engineers	6.6
Engineering technicians, except drafters	3.7
Engineers, all others	1.1
<i>Source: unpublished tabulations of Current Population Survey data furnished by the U.S. Bureau of Labor Statistics</i>	