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The talent imperative in the global chemical industry

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Introduction

Many companies will boast that people are their "most important asset." But is this claim always true? Are people really more valuable than any other asset? A cursory survey of some of our biggest industries would suggest they are not.

For example, companies that sell packaged foods, cleaning products, and hygiene products may place greater value on their star brands than the brand managers who create or manage them. In the same way, an oil company's reported reserves are likely its most prized asset, since without reserves even the most valued employees have little work to do.

The global chemical industry is no different. Depending on the business, the value of people is often trumped by other assets such as access to feedstock, proprietary manufacturing processes, patents, or new product pipelines.

So, if people are not always the most important asset to a business, why then is this claim so frequently repeated, whether in multi-day business conferences or on posters in the break room? For one, it sounds good, not only to the leaders who say the words, but to the employees who hear them. By now, the phrase has been repeated so much that it has become cliché and, like all clichés, the meaning of the words has been lost.

The global chemical industry is entering an era when companies will need to start viewing and valuing people as one of their most critical assets.

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But the fact remains: Sometimes people really are a company's most valuable asset.

As an asset, people – especially those who are highly adaptable to new environments – are most important during times of intense change. They can swiftly change to meet new needs, and creatively solve problems. Unlike other assets, people are dynamic. An ethylene cracker, for example, cannot change its primary function to solve a new and unrelated problem. Similarly, a factory can only formulate the chemicals it was designed to make. Even a Bunsen burner can really only make a fire; it cannot adapt to other functions. In an atmosphere marked by change, people will always play a vital role. At these moments, when companies need to make major decisions, and make them rapidly, the quality of their talent will likely be the only differentiating asset.

As explored in other publications developed by Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group¹, the global chemical industry is currently experiencing intense changes. A slew of new and on-going challenges – from constrained margins and increasing cyclicality, to activist investors and a dramatic decline in new product introductions – are forcing companies to make dramatic shifts in strategy to continue to generate the return on capital that investors have come to expect. What is more, global chemical companies will need to manage these changes in a difficult talent environment marked by a looming wave of retirements and incoming talent that seems to have little interest or awareness of importance of the industry to the economy and society at large.

As these changes continue to unfold and impact the industry, global chemical companies will need to attack markets in new and innovative ways. This will likely require companies to introduce new business models and build the corresponding talent capabilities to support them. Companies will also need to understand their talent needs, both in terms of headcount and skills. A talent acquisition strategy could attract the resources companies demand, as well as offer the employees a value proposition that helps with development and retention.

Addressing these challenges will not be an easy task for executives. However, there are several tangible steps that companies can consider to proactively tackle the most pressing issues now rather than reacting to them later, when it may be too late.



The current talent environment

There are three overarching talent challenges facing the global chemical industry:

- 1. Impending retirement of older employees
- 2. Skills shortages among the generation that will replace retirees
- 3. The general unpopularity of the industry as an employer of choice

The following examines these challenges and their context in greater detail.

The United States, one of the most significant markets in the global chemical industry, offers a significant snapshot of the talent issues facing the industry.² In

companies across all product lines, mass retirements are expected in the near term. In fact, within the next 10 years, 23 percent of the chemical workforce will be eligible to retire.³ On average, the workforce in the chemical industry is older than that of all other industries except agriculture, transportation, and public administration, which are all relatively small (See Figure 1). In other key chemical markets, Germany will experience the same retirement dilemma over the next decade with a long-term labor shortage anticipated.⁴ In the Netherlands, a skills gap has opened due to retirement and the lack of skilled talent available to fill it as more of these people seek careers in industries with a more innovative image.5



Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group analysis of the United States Bureau of Labor Statistics, Current Population Survey (CPS) 2013, accessed in September 2015.

The imminence of this wave of retirements means that the chemical industry will need to become a leader in defining and implementing solutions to address its talent gap. Other sectors may observe and implement best practices after they are proven, but the chemicals industry is unlikely to have this luxury. It will have to move fast while assessing against success metrics and discarding initiatives that prove ineffective.

In addition to having a higher median age than other industries, the overall age distribution in chemicals skews old. In many industries, the workforce has a bi-modal age distribution. This means that while there

Figure 2: Age distribution as a percentage of employees between chemicals and all industries



Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group analysis of the United States Bureau of Labor Statistics, Current Population Survey (CPS) 2013, accessed in September 2015.

is a significant percentage of older workers, there are also younger workers who can be developed to fill roles as older workers retire. In the chemical industry, the workforce is heavily concentrated toward the older age ranges (See Figure 2). Therefore, the challenge of developing young employees is magnified by the relatively small number of employees available. The implication is that the global chemical industry will need to acquire the talent needed to fill the gap. Unfortunately, the ability to acquire new talent runs directly into the second challenge - a large and deteriorating skills gap.

The shortage of Science, Technology, Engineering, and Mathematics (STEM) talent, the kind of talent that chemical manufacturers need, is a common and welldocumented challenge. However, a recent survey of manufacturing executives on the key skill deficiencies in their workforce⁶ revealed shortages of skills that

are even more fundamental than STEM. Executives noted the most serious deficiencies lie in technical and computer skills, followed by a lack of problemsolving skills, basic technical training, and math skills (See Figure 3).

Figure 3: Skills in which U.S. manufacturing employees are most deficient



Source: Deloitte United States (Deloitte Development LLC) and The Manufacturing Institute, The skills gap in US manufacturing: 2015 and beyond, February 2015, http://www2.deloitte.com/us/en/pages/manufacturing/articles/boiling-point-the-skills-gap-in-us-manufacturing.html. Moreover, just under half of executives surveyed noted deficiencies in basic employability skills (attendance, meeting deadlines, etc.) and employees' ability to work in a team.⁷ While chemical executives are rightly focused on the STEM shortage, the talent challenge for these companies likely run significantly deeper than STEM.

The good news is that despite these shortages, a number of countries are producing a growing number of STEM graduates.8

At least, this would appear to be good news. Because despite the growth, significant numbers of STEM

Figure 4: Ranking by respondents of industry preference if they were beginning their career today

Overall res	oondents	Generation Y (ages 19 to 33)		
Industry	Rank	Industry	Rank	
Technology	1	Technology	1	
Healthcare	2	Healthcare	2	
Financial services	3	Financial services	3	
Energy	4	Retail	4	
Manufacturing	5	Communications	5	
Communications	6	Energy	6	
Retail	7	Manufacturing	7	

perception-manufacturing-021315.PDF.

Overall, the data paint a concerning picture about the state of talent in the manufacturing industry. The industry is set to lose a significant portion of its workforce to retirement at a time when the talent needed to replace those workers would prefer to use their skills in other industries.

Solution one: Balancing flexibility with productivity

One frequently cited solution for attracting and retaining talent is offering more flexibility and a better work/ life mix. This may seem like an obvious move for employers. With little incremental cost, they can provide workers the flexibility they want, and attract and retain the top talent the organization needs. However, some argue that this strategy is fraught with risk and can lead to lost productivity, missed collaboration opportunities, and a weaker corporate culture. As with anything, the right solution for most companies is going to be somewhere in the middle, but how to strike the perfect balance of flexibility and productivity is a question executives may be struggling with for some time.

graduates are not following their degrees with work in STEM-related fields. A large majority (74 percent) of STEM graduates (holding a bachelor's degree) were actually working in non-STEM occupations.9

Furthermore, those graduates who want a career in STEM are less likely to look toward the chemical industry. A recent study developed by Deloitte United States and The Manufacturing Institute found that manufacturing (including chemicals) ranked last among industries as the sector where Millennials would want to start a career (See Figure 4). Additionally, manufacturing scored low as a choice even among older respondents.

Source: Deloitte United States (Deloitte Development LLC) and The Manufacturing Institute, Overwhelming support U.S. public opinions on the manufacturing industry, February 2015, http://www2.deloitte.com/content/dam/Deloitte/us/Documents/manufacturing/us-mfg-public-

An industry poised for change

The global chemical industry also faces a challenging business environment. The emerging issues, including consolidation, greater investor activism, and accelerated globalization, are compounded by existing issues, such as constrained gross margins and a lack of commercially significant innovation. These issues have both business and talent implications. Executives will likely need to re-think their business strategy and capabilities, as well as manage through talent dislocations as a result of industry trends (e.g., consolidation). Executives are facing an especially complex business landscape, perhaps one of the most difficult in the industry's history.

In response, three distinct business models will emerge that may help to fundamentally re-shape the global chemical industry's value chain. The emerging models will be:

- Natural owners: These companies have access to, or ownership of, a strong, advantaged feedstock position. They will fully understand their role in the industry and maintain focus on low-cost leadership. They could regularly deliver 20 percent return on capital, which is consistent with returns recently seen by the industry's strategic leaders. Examples include LyondellBasell (which has strong access to feedstock), SABIC (with its feedstock ownership), and the oil majors (who own the end-to-end value chain).
- 2. Differentiated commodities: These companies will typically hold a protected niche position or be able to play the boom and bust cycles of the industry. Companies under this model will require strong capital efficiency and must look to establish technology leadership where they can. In many respects, they are stuck between the generic

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strategies of cost leadership and differentiation, ¹⁰ a position that may impede their ability to deliver consistently high returns. Companies in this business model will likely generate returns on capital in the 10- to 20-percent range, consistent with average industry performers today.

3. Solutions providers: These companies focus on selling solutions versus simply selling solids or liquids. Much of the focus on solutions sales occurs at the end of the value stream. However, there are opportunities for firms focused on the intermediate space. An agriculture industry example is the fertilizer product that offers its farmer customers higher-crop yields. These solutions could entail a package of not only fertilizer, but also crop protection chemicals, and even equipment specifically designed to work optimally with those chemicals. This model is complex. It requires deep market understanding and the ability to form strategic partnerships within the solutions ecosystem. However, those who are successful can likely achieve market-leading returns on capital in excess of 30 percent. Companies such as Ecolab, Sigma Aldrich, and Monsanto are successfully moving into the solutions provider space.

It is important to note that companies may not automatically fall into these business models. Proactive decision-making and follow-on actions are necessary first steps. Executives will need to decide where they want to play and how they want to win. They will need to make decisions about which model to follow in order to meet their business objectives and then employ the proper assets and capabilities. Those who fail to decide and to act will most likely be overtaken by competitors who are making the tough calls and advancing their businesses.



Organization and talent implications for the new business models

Figure 5 looks at the distinct talent implications inherent with each model, with special attention to the relationship between business objectives, organizational capabilities, and talent-related capabilities.

Figure 5: Organizational and talent implications for the new business models



Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group, September 2015.

Building organizational and talent capabilities

In order to achieve the organizational and talent capabilities required for success, it is likely that each of these business models will employ a correspondingly consistent talent profile (see Figure 6).

Figure 6: Organizational and talent capabilities **Business models** Solution Natural Differentiated owners commodities providers Leveraging access to Monetizing market Delivering total feedstock and scale branded molecules nstream solutio **Organizational and** talent profile \Diamond "Traditional", efficient Blended organization Hub-and-spoke organization structure structure organization structure - Wide spans, few - Straight- and - Flexible resource dotted-line reporting lavers deployment - Few dotted-line relationships Talent Acquisition focus reporting relationships on strategy, marketing, Talent Acquisition Mature global mobility focus on finance. sales, research and legal, research and development Critical workforce development segments (i.e. focus on Innovative performance Robust succession those with unique skills management that make an outsized management impact)

Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group, September 2015

Solution two: Identifying talent early

The aerospace and defense industry, also a key draw for STEM talent, has realized that waiting for future talent to be in college before beginning recruiting may be leaving it too late. Thirteen years ago the industry launched the Team America Rocketry Challenge where middle-school students in the United States use aerospace design principles to build, test, and fly a rocket.¹¹ The objective is to build interest in STEM disciplines, aerospace in particular, and to simultaneously position event sponsors not only as industry leaders but also as attractive potential employers for the next generation of STEM talent.

In 2015 the contest drew 4,000 student participants in 48 states.¹² The results of the contest have been positive, with 81 percent of past participants announcing plans to pursue careers in STEM-related industries (which is good news for the chemical industry).¹³

However, seven out of ten past participants also said that they are a least somewhat likely to pursue a career in aeronautic or aerospace engineering (which is not such good news for chemicals).¹⁴ The global chemical industry is in a position to launch similar initiatives to help with early identification of future talent.

The apprenticeship model that is widely used in Canada, Germany, and Australia is a successful and positive means of identifying talent for high-skilled positions.¹⁵ Most apprentice programs help to align the resources where there is a gap in talent. Apprentices go on to help fill many of the positions that require STEM training. By now, the double-edged challenge facing the chemical industry should be clear. On one hand, executives need to determine how to maintain a workforce against challenging demographics. On the other, they need to adapt (in some cases radically transform) their existing organizational and talent models to develop the new capabilities (as noted above) in workforce segments that have not traditionally been viewed as business critical or even core to success.

So, where to start? Success will likely be driven by a few key organizational and talent capabilities. Anyone familiar with talent management may recognize them, as they are derived from the talent processes human resource departments have been implementing for

Solution three: Thinking more broadly on STEM

A recent study on what international students in U.S. programs are studying found that a high, and in many cases growing, number are focused on STEM (see Figure 7).¹⁶ The implication for global chemical companies is that when it comes to sources of talent, they need to think beyond their borders. Many of these students plan to return to their home country after completing their education. This means that chemical companies will need to engage these potential employees across a global scale and identify innovative solutions to attract and retain them (e.g., robust global mobility programs, satellite offices, global virtual work practices, etc.).

Figure 7: Students enrolled in STEM fields in selective markets



STEM

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years (with varying degrees of success). However, in the case of the global chemical industry, these particular capabilities need to be driven with a substantially higher degree of sophistication and maturity than has traditionally been employed.

Capability one: Next generation talent acquisition

The global chemical industry has typically followed a traditional talent-acquisition model, where companies recruit at a few select schools and target students with degrees in chemical engineering. Once hired, graduates are developed internally. Only when the needs arise for specific skill sets do companies divert from this model to recruit mid-career professionals.

Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group analysis of data from World Education Services, accessed in

Talent acquisition in the next generation will likely be different. Instead of a single-pronged approach, companies will need to recruit across four key dimensions:

- Strengthen at the core: While recruiting at core schools (those schools where companies recruit year after year) has always been key, university recruiting will likely become more competitive as new chemical engineers realize they have adaptable skills that can land them attractive jobs in high tech, consulting, or even financial services. Depending on its business model, a company may need to focus on recruiting candidates with different degrees (e.g., business majors to do market research) where the employer brand for chemicals may be weaker.
- 2. Expand into experienced hire pools: Given the required new skill sets and the aging workforce, relying on university recruiting alone to meet talent needs will likely no longer suffice. Companies may need to dramatically improve their abilities to identify, attract, hire, and on-board mid-career professionals. This will require the expansion of internal talent acquisition capabilities and engaging with new talent pools. For example, global chemical companies may now be searching for individuals with sales, marketing, and business strategy skills. They may look to people who currently work in consumer-packaged goods, as that industry develops professionals with some of the best skills in these critical areas. While bringing in resources like these may prove valuable for global chemical companies, it also represents a radical change from tradition and the adjustment will likely bring on unexpected challenges.
- 3. Leverage global geography: Given the demand for STEM graduates, global chemical companies will need to expand their search into the international talent marketplace. This will mean effectively planning for visa needs, establishing locations where there is a good match of talent supply and business demand (e.g., locations with strong education systems and access to feedstocks), and establishing global mobility programs to provide employees international experiences. With that comes the need to evaluate the qualities of the programs producing new graduates. It will also mean building diversity

and inclusion programs necessary to retain a more diverse workforce and extract the value that diversity can provide.

4. Double down on social media: Social media and Internet job boards have taken over the talent acquisition landscape, yet many companies continue to struggle with them. While it may be tempting to sit back and wait for others to figure out exactly how to leverage these platforms, global chemical companies simply cannot afford to wait. Candidates are using these platforms, and using them aggressively. According to a survey polling close to 2,000 recruiting and human resources professionals spanning across industries, 69 percent expect competition to increase in 2015 and 73 percent plan to increase social media recruiting.¹⁷ The chemical industry needs to be at the forefront of taking this interest and turning it into the full-time employment of top talent.

Additionally, companies will need to think past the notion that talent acquisition stops when the offer letter is signed. Enhancing onboarding programs is critical to ensure employees get the right start. Traditionally, onboarding programs have focused on ensuring employees understood policies and had completed basic tasks such as registering for benefits. In chemicals, this often meant employees would spend a significant amount of onboarding time in occupational health and safety classes. However, strengthening the onboarding process to focus on building a sense of connection with the organization can be critical in building employee engagement at the outset. Following are a few best practices to enhance the onboarding program:

- Assigning a peer level "buddy" to new hires, particularly high potential new hires
- Setting clear expectations with managers to level-set on responsibilities to ensure a positive onboarding experience for the employees
- Providing managers with tools, such as checklists, to ensure a consistent approach to onboarding
- Instituting formal check-ins at set intervals (e.g., 30 to 60 and 90 to 120 days) to evaluate if employees are successfully acclimating to the organization

Capability two: Identification and development of critical workforce segments

All talent is not created equal and should not be treated as such. Some talent takes the form of knowledge, skills, or abilities that are difficult to replace. Other talent makes outsized impacts on the value a firm delivers. However, a select portion of talent sits at the intersection of both. This is an organization's critical workforce segment (see Figure 8).

Figure 8: Critical workforce segment prioritization matrix

chain impact

Value



Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group, September 2015.

Understanding critical workforce segments can help a business target investments in order to attract, develop, and retain the talent that will matter most. Because the global chemical industry is undergoing massive change at the business-model level, understanding and investing in critical workforce segments is essential. Emerging segments of the workforce will require higher ongoing investment. These same segments may not have been traditionally viewed as critical (e.g., finance in the differentiated commodity business model). They may not be current priorities for executives. However, with robust workforce analysis and prioritization, the proper investments can be directed to those workforce segments that make the difference between succeeding or failing in the new environment.

In the business models defined above, the following talent segments emerge as critical in the global chemical industry:



Solutions providers:

Difficulty to replace skills

Industrial engineering
Manufacturing engineering
Supply-chain management
• Legal
• Finance
Research and development (R&D)
Product management
Business strategy
• Marketing

Capability three: Agile organizational development

In this new environment, global chemical companies will likely have to quickly deploy organizational plans that support new business models. Companies will need to be able to guickly re-design their organization, develop job profiles, assign competencies, and perform workforce transitions to ensure that people with the right skills are in the jobs where they are most needed.

They will also need to be able to both fill new roles and transition people out of old roles when another transformation comes along. This will require a new or enhanced capability to design, staff, and dismantle organizations, while maintaining legal and regulatory compliance and employee morale. It is not an easy task, particularly in an industry that has relied on traditional operating and organizational models for decades. However, building these capabilities and collaborating with human resources to drive organizational development will bring valuable and necessary flexibility.

Global chemical companies will also need to think differently about how they fill roles, with an eye to

flexibility. For example, a project under the Solution providers model may make it to the pilot phase before being dismissed as non-viable. This will leave a number of legacy employees "homeless" and could hamper executives' ability to halt an unviable project at the pilot stage.

In the new models, relying solely (or even primarily) on balance-sheet talent (i.e., full-time employees) is no longer sufficient.¹⁸ Global chemical companies will likely need to fully embrace the open-talent economy and its mix of balance-sheet employees, contractors, and freelancers to fill roles on either a temporary or permanent basis. Embracing this more expansive view of the workforce will also be critical in overcoming the workforce realities of the industry: the aging workforce, skills gap, and negative perception.

This two-pronged approach – developing at home, while staffing from a broader pool – will make a business faster and more flexible. For global chemical companies, it will be a key tool for meeting demographic challenges.



Capability four: Knowledge capture and management

With so much institutional knowledge set to retire and new workers inadequately prepared to fill the gap, capturing and institutionalizing knowledge has become more important than ever. Typically, when global chemical companies think about knowledge management they immediately focus on technology, believing that building a database of knowledge is the same as owning and controlling it. However, technology alone cannot extract the knowledge that resides in experienced employees' memories. Nor can technology provide the context needed to make the knowledge usable, particularly for new employees or those trying to develop their skills.

Therefore, as global chemical companies invest in a knowledge-management system, they need to consider the capability integrations, processes, and culture components required to make that system an effective solution. They will also likely need to focus on the following:

• Integration with learning: Knowledge has no value if people cannot apply it. Most companies separate knowledge management from learning and development as stand-alone capabilities. These capabilities actually need to be tightly linked, incorporating institutional knowledge in both formal



and informal learning programs. This will enable employees to build skills in the areas that have proven to be of the most value to the company.

- **Process:** A knowledge-management system will fail without clear processes that dictate when knowledge should be entered (and when it should not), and when and how data should be cleansed to ensure it is both current and accurate. Without these processes it is too easy for the system to become inundated with old or irrelevant data that is neither actionable nor useful for employees.
- Culture: Perhaps the most important and difficult component of building effective knowledge management is building and maintaining a culture where knowledge is valued. In many organizations, knowledge equates to power and prestige, and is closely guarded. Breaking this cycle so that people are rewarded (whether formally or informally) for sharing knowledge is key to success.

The good news is that much of the work around knowledge management (e.g., culture building) can begin with little up-front financial investment. Systems can be developed simply (e.g., a homegrown database) and then expanded over time. The key is to put the process, culture, and integration elements in place first and then grow a technology platform to support these other elements.

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Applying the capabilities

Solution four: Understanding the Millennials

The Deloitte Millennial Survey 2015, published by Deloitte Touche Tohmatsu Limited, included responses from more than 7,800 Millennials worldwide and measured their perspectives on the economy and business.¹⁹ While some of the findings were not surprising (e.g., Millennials appreciate employers who make a social impact), there were other distinct insights that are highly relevant to the global chemicals industry. The survey also includes a list of key attributes that Millennials value in employers. Many of them align with the overall objectives of the global chemicals industry. For example:

- 60 percent of Millennials choose to work for an organization, at least in part, because of its purpose. This is a benefit to those global chemical companies that have a strong value proposition making products with social development applications. Ending hunger, for one example.
- Millennials find large-scale, well-established global businesses "twice as appealing" as small organizations. Again, the global chemical industry is well-positioned because many global chemical companies have histories that stretch back a century or more.
- 73 percent of Millennials believe that business has a positive impact on society. This bodes well for global chemical companies that are increasing their focus on environmental solutions and other social issues.

However, there were other survey findings that should give chemical executives pause. For example:

- The Technology, Media, and Telecommunications (TMT) sector was identified as the most desirable, while the global manufacturing industry (which includes the chemicals sector) is one of the least.
- Millennials believe TMT has strong leaders and that the sector can provide them with the most valuable skills. Manufacturing was viewed as not offering the same.
- · Millennials do not see the global manufacturing industry making an impact on society, developing individuals, or increasing their wealth, when compared with most other sectors.
- Millennials feel they need to develop leadership, sales, and entrepreneurial skills to be better valued as business professionals. The global chemical industry is not generally regarded as an incubator of these skills.

With these challenges in place, what should global chemical companies do to attract and retain Millennials? Although there is no silver bullet solution, there are a few relevant ideas executives should consider:

- Work to understand the value proposition that makes TMT so attractive. Is it the entrepreneurial aspects of the industry, the ability to work on the latest technology, the opportunity to build networks with strong leaders, or some other combination of factors? Whatever it is, providing it is understood, the global chemical industry may be able to match the value proposition, particularly given the industry's role in helping shape the future of Advanced Material Systems.²⁰
- Reinforce the growing importance of commercial and marketing functions. As the global chemical industry evolves, commercial organizations will become more important. It is time to start promoting this to Millennials, who put a high value on those skills.

Integrating the capabilities outlined above may sound like a lot of work and investment. However, not all of these capabilities are equally important to every business model. For example, knowledge management could be critically important for Natural owners because understanding the nuances that make a production process most effective could be vital for capturing additional margin. On the other hand, knowledge management may be less important for Solution

providers because of the new and experimental nature of the business. While it is certainly important to capture that knowledge, the near-term impact may be less critical.

for their operation.

Figure 9: Investments in organization and talent



Source: Deloitte Touche Tohmatsu Limited Global Manufacturing Industry group, September 2015.



Figure 9 provides a guide for executives as they think about their investments in organization and talent, and make decisions about which business model works best



Solution five: Building collaboration with human resources

To arrive at a new state of talent management, business-side executives will need to collaborate with and receive proactive support from human resources. However, a recent survey of executives across multiple industries found that current levels of collaboration are insufficient.²¹ Executives across supply chain, technology, finance, procurement, and operations had predominantly unfavorable impressions of human resources.²² Only chief executive officer-level leaders (who typically get direct support from the chief human resources officer) felt that the human resources department was performing well. Interestingly, human resources executives (though less than a majority of them) also gave human resources high marks, indicating a possible lack of self-awareness in the function (See Figure 10).



Figure 10: Performance of the Human Resources function in helping meet talent requirements

Source: Deloitte United States (Deloitte Development LLC), Supply chain talent of the future: Findings from the third annual supply chain survey 2015, accessed in September 2015, http://www2.deloitte.com/content/dam/Deloitte/us/Documents/strategy/us-operations-supplychain-talent-of-the-future-042815.pdf.

The issues surrounding collaboration are challenging, considering that human resources is the natural home to many of the capabilities that a business will require to drive its organization and talent agenda. There will be no easy fix. However, as a starting point, business executives looking to advance a new talent agenda should proactively engage their human resources partners in the initiative. Because collaboration is a

two-way street, executives should also make the sure the human resources partner has a seat at the table. Working together, they can strive for early agreement on the cross-functional metrics that will be impacted from the initiative and, furthermore, determine how business and human resources stakeholders will be held to account for achieving results.

Summary

A true, thorough, and effective rethink of a talent strategy is certainly a difficult task for any company, but it becomes especially daunting in the global chemical industry. It means a dramatic shift in thinking. It means moving away from a traditional model that carries with it the inertia of a century-old record of success.

But the global chemical industry is in the midst of great change. New realities call for new models, and new models require new talent capabilities. Traditional engineering and technical skills will still be important, but increasingly, companies will need to find talent from non-traditional sources. The confluence of the traditional and non-traditional will help create the kind of talent pool that will be necessary to compete into the future.



For over a century, companies in the global chemical industry have been taking on and solving some of the world's most pressing problems, all the while returning billions of dollars to shareholders. Unfortunately, this admirable track record does not guarantee another 100 years of the same. It is only with a true recommitment to talent that companies will be able to navigate the turbulent times ahead and continue to generate shareholder value. The global chemical industry is beginning a new and exciting era. The people working in it will be the catalyst to once again make the industry a leader among sectors and an attractive, exciting place to build a career – but only if executives act now to build those few but critical organizational and talent capabilities required to attract, develop, deploy, and retain the people the industry will need.

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Fnd notes



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¹ Deloitte Touche Tohmatsu Limited (DTTL) Global Manufacturing Industry group, The chemical multiverse: Preparing for quantum changes in the global chemical industry, November 2010, http://www2.deloitte.com/global/en/pages/manufacturing/articles/chemical-multiverse-quantumchanges-global-chemical-industry.html; DTTL Global Manufacturing Industry group tracks a five-year analysis of the global chemical industry using data from Capital IQ that analyzes over 200 global chemical manufacturers, September 2015. The ongoing analysis examines revenue growth; return on capital; gross margin; debt to equity; and selling, general, and administrative (SG&A) expenses/research and development (R&D) as a percentage of revenue.

² Nasdaq, "Chemical Industry Stock Outlook - April 2014 – Industry Outlook," 11 April 2014, http://www.nasdaq.com/article/ chemical-industry-stock-outlook-april-2014-industry-outlook-cm343795.

(CPS) 2013, accessed in September 2015.

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