

Steering through Turbulence

Energy & Resources firms need to
take bold decisions that will
ensure future resilience

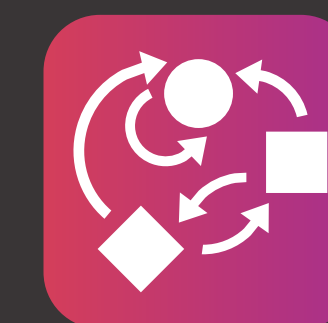
Energy & Resources Industry



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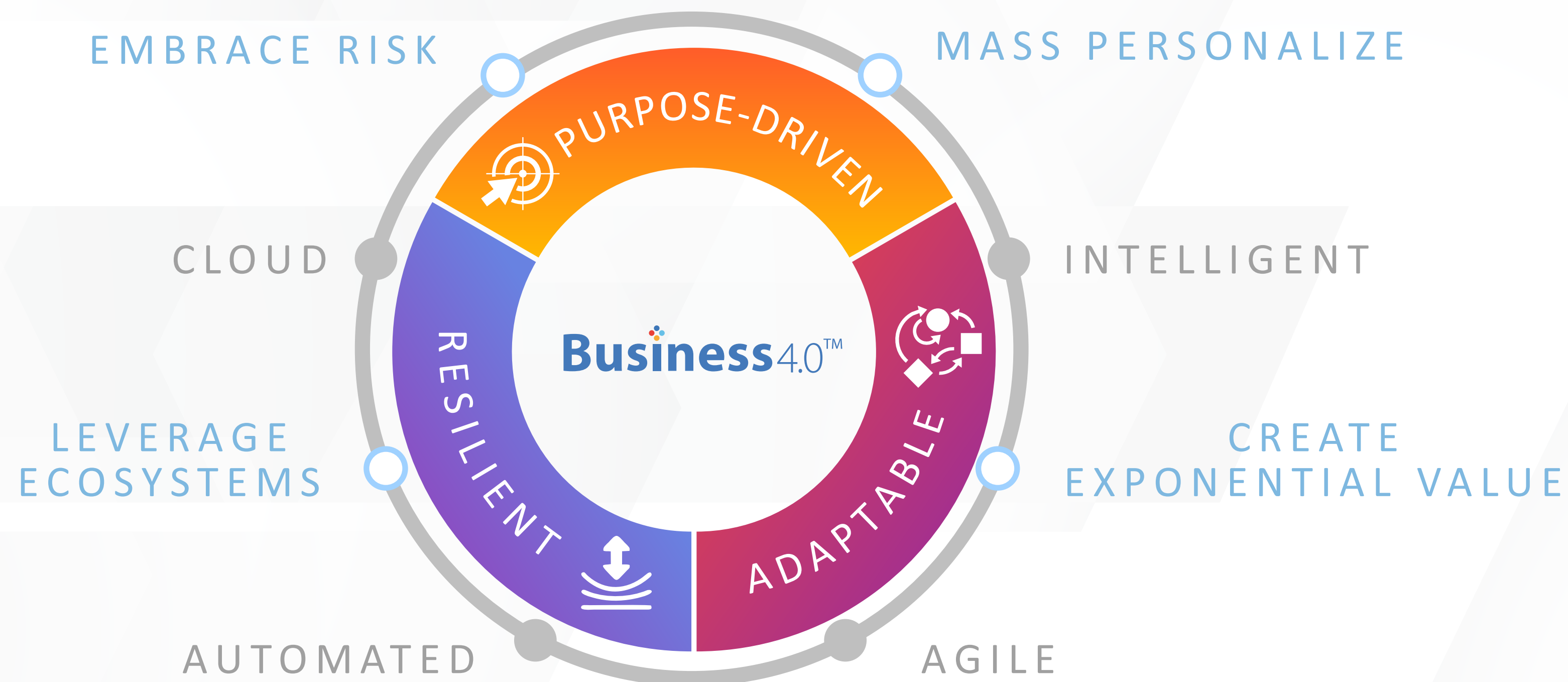
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Executive Summary

Individuals and industries alike are faced with an unprecedented challenge in the form of the COVID-19 crisis. The lockdown and social distancing norms have shuttered all regular activities. In addition to disrupting the social and economic environments across the board, the pandemic has specially crippled the energy and resources industry. It has also raised serious questions about the survival of a large number of players. Given this is still an evolving situation, there is widespread confusion in terms of understanding and subsequently addressing future plans that will likely be very different from those imagined earlier.

The pandemic has resulted in demand collapse for essential products and services generated by the infrastructure industry including oil and gas, metals, mining, engineering, and construction companies. Demand for both auto and jet fuel more than halved in a matter of days. Events that were considered impossible a short while ago, such as WTI crude oil futures contracts closing in the negative territory, have come to pass. As global crude oil and petroleum products storage facilities reach saturation there will be serious repercussions.

It is time to take bold decisions to be resilient and to shape up new opportunities. Crisis breeds innovation as we say or in this case creates a distinct vision of the future, which is more consumer and product centric. How we take advantage of the impending consolidation, create synergies among players, reshape services and offerings, use technology to drive efficiencies and create an organization of the future, will define the new set of players. The ideas behind Business 4.0™ are especially relevant today as purpose-centric ecosystem play becomes the only way to not only drive efficiencies at scale and create services for the future but also to remain relevant and lead with sustainability. While the crisis will drive efficiency and consolidation, it will also speed up energy transition where the only way to ensure growth will be anchoring or participating in a strong ecosystem of players to create differentiated products at sustainable cost.



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Troubles Predate COVID-19

While the industry is evaluating the overarching impact from the current crisis, it is important to remember that the challenges for the Energy & Resources (E&R) industries did not start with the global pandemic. For example, the price war over crude oil was already under way before the worst outbreaks took hold. Global petroleum supply-demand imbalance, slowing economic growth and industry restructuring for energy transition have all put pressure on the energy sector. On the other hand, the metals sector was already dealing with low demand on the back of slowdown in the automobile and infrastructure segments as well as the downturn in China. Given the E&R industries were grappling with a slowdown scenario pre-COVID-19 outbreak, we need to look at the pandemic as a super accelerant rather than a root cause for the current issues.

Going forward, the future of the E&R firms will be further impacted by a number of changes occurring both within and outside these strategic industries. For example, the oil and gas industry will be faced with a generational change in demand with the uptick in electric vehicles matched with large-scale storage of electric power. Within the industry, trends like next generation reservoir modeling, advanced production techniques and aggressive refinery modernization, and national concerns around resilient fuel supplies will reshape the overall petroleum supply. The global pandemic might just accelerate these trends.



New Challenges Call for New Plans

Given the uncertainties around the economic response to the crisis - supply-demand volatility, impact on crude from political measures, and the overall imbalance in the impact for international against the US oil industry - it is evident that in addition to the need-based response on a war footing, companies need to accelerate energy transition and structural reforms. The divide between the energy companies and the end consumer needs will have to be bridged through a methodical transition towards more consumer-centric organizations.

The uncertainties that we face today will need to be addressed by entirely new strategies and work models. The E&R companies will need to come up with ideas and invest in plans that will not only help them steer through in the immediate term, but also provide insulation over the medium term. The firms will need to engage in risk-based evaluation of partners and deepening ties with those who can offer depth and breadth that can help craft flexible long-term response to the crisis. The continuation of the pandemic situation may likely make it necessary to temporarily move services, like natural gas chromatographic testing or marine crew boat operations, back in-house especially if a critical vendor has been impacted by the crisis.

Redefine Purpose and Prepare to Help Restore Order

We feel this is an important time for the E&R industries to reflect and re-evaluate their core purpose. The efforts we invest in preparations will help us capitalize on the opportunities that will follow once we are safely out of the crisis. While the outlook for the world economy remains hazy at best, it is important to remember infrastructure and energy are the crucial and basic requirements that facilitate smooth functioning of the world. Additionally, aside of the economic stimulus, infrastructure spending will be key to reviving the global economic slowdown.

Additionally, no set of industries have as much capability and responsibility to help the world achieve its global sustainability goals. From building eco-friendly facilities to operating refineries with lower emissions, to reducing the requirements for water in mining operations the E&R industries have the ability to change the reach for sustainability at a truly global scale.

Right now, it is necessary to close down wells, dial back facilities, and cancel projects in the face of the pandemic and the subsequent lockdowns. However, this must be undertaken in a mindful way with the guiding idea of protecting and preparing for the future. In addition, in chaotic times like these, it is important for the Energy & Resources industries to fall back on their deeper purpose. This, in turn, can help provide a crucial view towards understanding and consequentially devising action plans to deal with the rapidly evolving situation.



Adopt New Capabilities to Become Resilient

There is no crystal ball to peak into and foretell the end of the crisis and we do believe the glimmer of recovery will be seen in the energy and resource markets in different geographies, at different rates and in different ways. However, the shocks are far from over and the recovery is undermined by the fear of the pandemic. Even the most optimistic forecasts for the recovery of petroleum demand foresee unexpected fractures in the supply chain. Even though host countries and regulators seem poised to intervene to help industries, the efforts will result in delayed and unintended consequences.

Given it is difficult to make tangible predictions for the future of the businesses, we believe this is a good time to invest in adopting advanced capabilities to prepare for opportunities that may emerge post the crisis. We believe businesses can gain resilience through capabilities like analytics, automation, and deep collaboration. Advanced analytics and modeling will help the E&R companies gauge the future possibilities and better withstand shocks in the face of crisis, not to mention, even shutting down temporarily in the most profitable way rather than in reverse. In addition, we feel the current crisis may be an opportunity to gain a competitive edge by investing in capabilities that will help secure an intimate understanding of the operations at the local and global levels. This in turn will help arm the companies with crucial information that can ensure operational resilience across the value chain.



Adapting to Face the Unpredictable Challenges

While the companies invest in capabilities to enhance resilience, they must also be able to be nimble enough to scale up and scale down – instantly, change directions – while in motion, and learn new skills – in the middle of the fight. For example, with the storage facilities for crude oil and products reaching saturation point, oil companies will need to relearn the management of the crude oil value chain. They will also need to ensure flexibility after decades of running wells and facilities at maximum rather than optimum capacity. Being agile and reskilling the workforce continuously to repurpose and adapt to solve different problems will also make them resilient and better prepared for unpredictable challenges. Lastly, to lead in the post-COVID-19 world companies must lead with purpose-centricity towards flexible supply to meet demand,



reduce carbon footprint and enhance safety. They need to be at the front and center of inter-operable ecosystems that continuously embrace change and maintain end-to-end operations even in the face of accelerated shifts and uncertainties.

Moving Forward Together

The concept of Business 4.0 is rooted in the ability of the businesses to reorganize the thinking, while simultaneously crafting a series of responses to address a completely unprecedented and rapidly changing situation. The framework has been tested and developed over the past few years, however its relevance is uncannily appropriate in addressing the current global crisis accelerated by the pandemic.

In the past, the framework has been used successfully to transform regional 'refining and marketing' players to international players, to transform distribution of crude oil and refined products, and to help a major global firm transform oilfield operations to reduce cost, increase throughput and enhance safety.

The unrepresented nature of the health and economic crisis will ensure that not only we use the framework to continually reimagine the businesses but also accelerate the transformations for sustainability. A boost in the way of infrastructure spending will help generate jobs and aid economic growth spelling out opportunities for the companies engaged in this sector.



About the Authors



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In a career spanning over two decades, Manish has held several leadership roles across continents and has been at the forefront of the digital transformation. He has partnered with the world's leading organizations to transform their businesses in the new digital era. His experience in strategy, business transformation, technology transformation and innovation spreads across Energy, Metal & Mining, Manufacturing, Life Sciences and Insurance sectors.

Manish is a strong believer of TATA Group core values. He personifies TCS commitment to its culture of customer centricity, its reputation for high service quality, its tradition of innovation and is a champion of diversity and inclusion.



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In her 30+ years with TCS, Seema has worked with various global customers to drive business strategy and bring transformation and innovations. She has led large program management, sales and marketing and general management projects across several industries. Seema spearheaded multiple global product implementations for multinational Banks & Financial Institutions, and mission critical government sector programs.

Seema is deeply committed to diversity and inclusion in the workplace. As one of the top women leaders at TCS, she has helmed several initiatives such as women & diversity, employee safety, social responsibility, leadership competency building and employee development.

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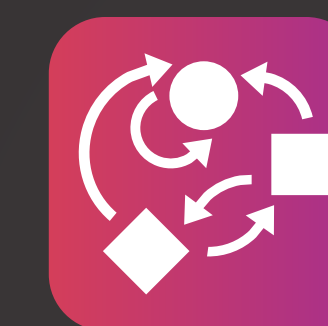
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