HFS Research

HFS Top 10 Life Sciences Service Providers – Excerpt for TCS

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TOP 10

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The life sciences industry is hurtling toward a hyperconnected future state that requires a patient-centric collaborative ecosystem. The role of third-party service providers is no longer just supporting "business-as-usual," but to support their clients in driving "meaningful change."

— Saurabh Gupta, Chief Research Officer

What you'll read

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HFS Research

Introduction, methodology, and definitions

Introduction

- *The HFS Top 10 Life Science Service Providers* report assesses the global life sciences industry across pharmaceuticals, medical devices, and med-tech segments to understand the key strategic themes influencing the industry and the resultant impact on IT and business operations.
- We deep-dive on the role third-party service providers need to play in life sciences industry. We assessed and ranked the life sciences specific service capabilities of 14 service providers across a defined series of innovation, execution, and voice of the customer criteria. The report highlights the Top 10 overall rankings for the participants as well as rankings at a sub-category level.
- The service providers assessed in this report include (in alphabetic order) Accenture, Atos, Capgemini, Cognizant, Conduent, DXC, EPAM, Genpact, HCL, Infosys, TCS, Tech Mahindra, Wipro, and WNS.
- Please note that the report focuses on leading broad-based service providers that offer IT and business process services across the life sciences value chain. Specialists that focus on specific segments of the value chain such as CRO (clinical research outsourcing) providers are not in scope of this report.
- This report also includes detailed profiles of each service provider, outlining their overall and sub-category rankings, provider facts, and strength and weaknesses.

Service providers covered in this report

The report focuses on leading broad-based service providers that offer IT and business process services across the life sciences value chain. Specialists that focus on specific segments of the value chain such as CRO (clinical research outsourcing) providers are not in scope of this report.

accenture
Atos
Capgemini
Cognizant
CONDUENT
DXC.technology
epam
genpact
HCL
Infosys Navigate your next
TATA CONSULTANCY SERVICES
Tech Mahindra
wipro
WNS Extending Your Enterprise

HFS' Life Sciences Value Chain

TOP 10

Primary report focus

Industry specific

Pharmaceuticals, medical devices, biotechnology				
Research and development	**Regulatory**	**Pharmacovigilance**	**Supply chain**	**Sales and marketing**
• Market and competitive intelligence • Drug research and discovery • Preclinical studies • Clinical trials • Clinical data management • Medical writing and publishing • Biostatistics and statistical programming	• Dossier writing, compilation, and submission • Pre- and post-submission services • Drug tracking, incidence reporting, recall and compliance management • Product lifecycle management • Artwork, label, and pack management	• Data collection and case processing • Medical review • Medical writing and reporting • Remote monitoring and safety surveillance • Signal detection • Risk management	• Order management • Inventory management • Manufacturing management • Distribution planning and analysis • Defect handling • Reverse logistics	• Sales operations and analytics • Marketing operations and analytics • Market research

Horizontal

Enabling technologies

RPA ● Artificial intelligence ● Smart analytics ● Blockchain ● IoT ● Cloud ● Mobility ● Social media ● Augmented and virtual reality ● 3D printing

Horizontal IT processes

Planning, design, and implementation ● Application development and maintenance ● Infrastructure management ● Security

Horizontal business processes

Customer engagement ● Human resources ● Procurement ● Finance and accounting ● Payroll ● Legal and compliance

HFS Research

The life science value chain defined (1 of 2)

- HFS developed the industry value chain concept to graphically depict our understanding of the processes and functions that specific industries engage in to operate their businesses.
- HFS' industry value chain for life science operations provides a comprehensive overview of services for the healthcare industry. **Industry-specific processes** include the following specific value chain functions:
  - **Research and development:** Processes related to new drug development and formulation including pre-clinical studies, clinical trials, and market and competitive intelligence;
  - **Regulatory:** Services enabling compliance with various regulatory requirements, both pre-submission and post-submission;
  - **Pharmacovigilance:** Processes supporting the detection, assessment, understanding, and prevention of adverse effects or any other drug-related problem after they have been licensed for use;
  - **Supply chain:** Services that support the flow and management of inventory from inception to consumption;
  - **Sales and marketing:** Services that enable sales and marketing operations and related analytics.

The life science value chain defined (2 of 2)

- **Enabling technologies:** So much of the innovation and change taking place in life sciences and pharma is driven by new technologies, which include elements such as RPA and AI, blockchain, and smart analytics. We view them as horizontal as they can be used across life sciences and pharmaceutical enterprises, and they can be leveraged for both horizontal and industry-specific processes. Our research on these topics will focus on how they are being utilized within life sciences and pharmaceutical companies, which service providers are bringing them to the table, and what real business impact is being realized.
- **Horizontal IT and business processes:** Enterprises in all sectors have a range of consistent business and IT processes that are essential to running their businesses but are executed similarly regardless of industry. We refer to these as horizontal processes and have segmented them by IT and business functions, as outlined in Exhibit 2. Horizontal business processes include elements such as customer engagement, finance and accounting, procurement, and HR. IT processes include functions such as application development and maintenance and infrastructure management. In addition to industry coverage of these horizontal topics, they will also be well covered as part of our functional research dimension.

Executive summary

Executive summary

TOP 10 HFS

The life sciences industry is hurtling toward a hyperconnected future state that requires a patient-centric collaborative ecosystem across healthcare, life sciences, and the public sector. The industry has to transform while simultaneously managing pricing pressures, low R&D returns, and changing product mix (rise of biologics, personalized medicine, and med-tech). Emerging technologies across the Triple-A Trifecta (automation, analytics, AI) along with IoT, blockchain, AR/VR, and 3D printing have captivated the C-suites to get to the promised land. But the roadmap to get there continues to be hazy. The role of third-party service providers is no longer just supporting “business-as-usual,” but to support their clients in driving “meaningful change.”

Life sciences industry trends

- Pressure on profitability (pricing pressures, low R&D returns, value-based contracts)
- Wait-and-see approach to investments, particularly M&A given Affordable Care Act (ACA) and tax reform, especially in the US
- Continued pressure on R&D returns with ongoing patent expirations and rise of biosimilars
- Breakthrough drugs given positive regulations such as 21st Century Cures law
- Rise of biologics, personalized medicine, and med-tech
- Smart ecosystems through partnerships with payers, providers, technology players, and clinical collaborations
- Managing risks and uncertainty especially cyber threats
- Leveraging emerging technologies such as AI, RPA, and predictive analytics to drive innovation, develop new therapies, and address productivity challenges
- Increasing role of social media, mHealth, wearables, connected devices, and telemedicine in how patients engage in clinical trials

Impact on third-party services

- Digital OneOffice: patient centricity, linking data and talent across silos
- Hyperconnected enterprise: collaborative ecosystem across healthcare (payers and providers) and life science
- Triple-A Trifecta: AI for drug discovery and pharmacovigilance (PV), RPA for productivity, big-data analytics
- As-a-Service: using talent and technology in a more agile and impactful way
- Data-centric mindset to maximize data quality and value
- Horizon 3 technologies: blockchain, IoT, AR/VR, and 3D printing
- War for talent: data scientists, statisticians, technologists
- Cyber-security by design
- Lines blurring between ITS, BPS, and pharma-specific

The HFS Top 10 life science service provider rankings

Research methodology

The HFS Top 10 Life Science Service Providers report assessed and scored 14 service providers across execution, innovation, and voice of the customer criteria. The inputs to this process included detailed RFI responses and structured briefings with service provider leadership as well as interviews and surveys from their clients. In order to drive objectivity to our research methodology, we interacted with reference clients provided by the service providers as well as non-reference life sciences clients sourced through our own network for each service provider assessed. Specific assessment criteria include:

33.3%

Ability to execute

- **Size and experience** including life science revenues and scale (# of FTEs)
- **Business process and IT services** scale and capability
- **Client mix** based on number of clients, average size of engagements, and percentage of large clients in the portfolio
- **Industry domain expertise** based on breadth and depth of value chain coverage

33.3%

Innovation capability

- **Clear vision for the life science industry** including credibility of go-to-market strategy and strong understanding of industry trends
- **Investments and ecosystem** based on organic and inorganic investments and strength of partnership ecosystem
- **Deployment of emerging technologies** across RPA, AI, smart analytics, blockchain, and IoT
- **Co-innovation and collaboration** with clients including creative commercial models, joint solutioning, and flexibility in engagement models

33.3%

Voice of the customer

- **Client satisfaction** with services based on direct feedback from enterprise clients. Driven by interviews and surveys with client references provided by service providers as well as non-reference clients sourced directly by HFS

HFS Top 10 Life Sciences service provider rankings

TOP 10

Rank	Overall HFS Top 10 position
#1	TATA CONSULTANCY SERVICES
#2	Cognizant
#3	accenture High performance. Delivered.
#4	HCL
#5	Infosys Navigate your next
#6	Capgemini
#7	wipro
#8	Tech Mahindra
#9	genpact
#10	Atos

Service providers (alphabetic order)	HFS Point of View
Accenture	Scaled up consulting, technology, and execution capabilities that combines new science, emerging technology, and operations to transform life sciences
Atos	"Two Speed" approach that supports life sciences clients to operate existing business with excellence while driving innovation
Capgemini	Providing strategic, commercial and technical services to handle the digital transformation of historically manual life-sciences processes
Conduent	Helping life sciences with the digital evolution of patient and healthcare provider engagement leveraging emerging technologies and business process services heritage
Cognizant	Building the "Fused Life Sciences Enterprise" that is connected with the overall healthcare ecosystem by leveraging an integrated solution approach across front, middle, and back
DXC	Digitizing the Life Sciences value chain to enable new industry business models and better health outcomes
EPAM	Integrating design and engineering experience with life sciences domain expertise
Genpact	Domain-led digital solutions for life sciences
HCL	Technology-led solutions driven by its Mode 1-2-3 strategy to help its life sciences clients be future ready
Infosys	"Navigate your Next" with life sciences focused digital solutions and next-gen technologies
TCS	**IP-focused and platform-based offerings for life sciences backed by strong domain expertise**
Tech Mahindra	Supporting life sciences clients to Run, Change, and Grow (RCG) with digital IT Services that drive efficiency while transforming.
Wipro	Driving business value by focusing equally "revitalizing existing enterprise" as well as "curating new DNA"
WNS	Life sciences domain, process, and analytics expertise to drive real business outcomes

Notes: The service providers assessed in this report include (in alphabetic order) Accenture, Atos, Capgemini, Conduent, Cognizant, DXC, EPAM, Genpact, HCL, Infosys, Tech Mahindra, TCS, Wipro, and WNS.
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Notable performances in HFS Top 10 Life Sciences Service Providers

TOP 10

HFS Podium Winners Top 3 providers overall across execution, innovation, and voice of the customer criteria		
#1. TATA CONSULTANCY SERVICES	#2. Cognizant	#3. accenture

Execution powerhouses Top 3 providers on execution criteria			Innovation champions Top 3 providers on innovation criteria			Outstanding Voice of the Customer Top 3 providers on voice of the customer criteria		
#1 Cognizant	#2 TATA CONSULTANCY SERVICES	#3 accenture	#1 accenture	#2 Infosys	#3 HCL	#1 Infosys	#2 HCL	#3 epam

Other notable Top 3 performances

- **Genpact** ranked #2 for Life Sciences BPM services and #3 for emerging technologies
- **DXC** ranked #3 for Life Sciences IT services

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Life science service provider profiles

IP-focused and platform-based offerings for life sciences backed by strong domain expertise

TATA CONSULTANCY SERVICES

HFS TOP 10

Dimension	Rank
HFS Top 10 position	#1
Ability to execute	
Size and experience	#2
BPO	#3
ITO	#1
Client mix	#2
Industry expertise	#6
Innovation capability	
Investments and ecosystem	#5
Emerging tech	#5
Co-innovation and flexibility	#8
Clear vision	#2
Voice of the customer	#6

Strengths

- **Strong domain expertise:** Across the life sciences value chain and clinical services KPO, life sciences and healthcare Oracle/SAP services, supply chain and manufacturing, sales and marketing, medical device engineering, and bio-statisticians. Brings in specialized expertise over 20 therapeutic areas such as oncology, CNS, and orphan drugs. It has been involved in over 5,000 clinical trials impacting 5 million patients.
- **IP focused go-to-market:** TCS' life sciences unit has filed for more than 295 patents and has been granted more than 60 patents. The IP-led approach allows TCS to capture emerging opportunities in genomics, bio-informatics, connected devices, and 3-D printing by leveraging TCS COIN ecosystem.
- **Digital platforms for life sciences:** Including Decision Fabric (to democratize analytics), Life Science Advanced Drug Development (ADD) platform, Connected Clinical Trials (CCT) platform, and Cognitive Commercial Intelligence Platform along with nine innovation labs to conduct PoCs and showcase digital solutions.

Development opportunities

- **Execution versus innovation:** TCS has very strong execution, a strong set of digital solutions and associated IP; however, execution messaging can be complemented with innovation in line with strong corporate R&D investments.
- **Mid-market expansion**: Creating higher presence in mid-market to augment existing strong presence with Big Pharma.

Revenue breakdown

Not disclosed

IT vs BPS

Not disclosed

Capabilities across life science value chain

Not a focus | Emerging | Mature

Research and development	Regulatory	Pharmacovigilance	Supply chain	Sales and marketing

Relevant acquisitions and partnerships

Acquisitions:

- **W12 Studios**: Specialists in the design of digital products, from brand strategy to the product and interaction experience (November 2018)
- **Bridge Point Group:** US management consulting firm (November 2018)

Partnerships: TCS nurtures strategic partnerships in alignment with its broad vision of simplification, automation, digital reimagination, and governance.

TCS' strong network of partners includes:

- **Platform vendors:** Google, Microsoft, IBM
- **IoT platform partners:** GEPredix, Siemens MS, SAP Leonardo, PTC Thingworks, IBM Watson, MS Azure IoT, AWS IoT, MindSphere
- **Communication:** Cisco, Juniper, BROCADE, Tata Telecom, BT
- **Devices and sensors:** Intel, Freescale, BOSCH, ARM, TI
- **Cloud partners:** AWS, Azure, SAP, Oracle, Google, Ericsson, Digi
- **Analytics and application:** SAP, Tableau, Omneo, Microsoft, iRise, PTC, Cloudera

Key clients

Number of life science clients:

- Not disclosed

Client geographic spread:

- Not disclosed

Key clients:

- Fifteen of the top 15 pharma companies
- Nine of the top 10 medical devices companies
- Three of the top five biotech companies
- Three of the top three US pharmacies

Global operations and resources

Life sciences headcount: Not disclosed

TCS has a global delivery footprint covering 145 solution centers across 19 countries

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Saurabh oversees HFS' global research function managing the global team of analysts across US, Europe, and Asia-Pac. He sets the strategic research focus and agenda for HFS Research, understanding and predicting the needs of the industry and ensuring that HFS maintains its position as the strongest impact thought leader for business operations and services research.

As an analyst, Saurabh leads our coverage for horizon 3 change agents such as blockchain, business services (such as finance and accounting and supply chain), and industry services including healthcare and life sciences. Saurabh also analyses overarching and cross-cutting themes under the OneOffice concept like digital change management

Mayank Madhur is a Knowledge Analyst at HFS Research, supporting different practice leads in area of Industry Research, IoT and Blockchain by working on secondary research, data analysis, PoVs and research writing.

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