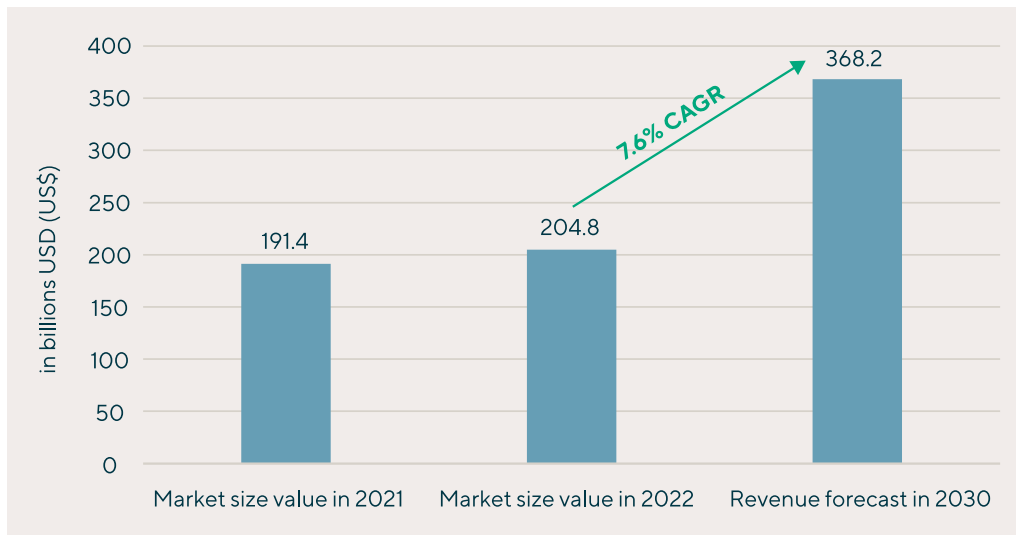


Outsourced Healthcare Logistics: Ripe for Private Equity Investment

Ample consolidation opportunity for private equity (PE) to capitalize on accelerating healthcare trends and consistent well-above GDP growth rates

Favorable market fundamentals supporting the mid-and-long-term outlook for healthcare third-party logistics (3PL) service providers

According to recent data, the nearly \$200 billion global third-party healthcare logistics market is projected to increase at a CAGR of more than 7% between 2022 and 2030.



This outlook combines an increasing trend towards outsourcing with underlying favorable secular trends driving demand for healthcare products and services:

- Aging populations and increasing life expectancy (especially in developed economies)
- Increasing number of healthcare (medicine as well as devices) and adjacent products with unique logistics needs
- Increasing industry regulation and strong reimbursement trend
- Increasing demand for distributed and ancillary healthcare logistics service
- Data-driven healthcare solutions by providing not only precision but also prevention approaches
- Growing importance of specialist and (ultra-)temperature-controlled capabilities throughout last-mile delivery such as for the COVID-19 vaccines of Pfizer and Moderna
- Pressure from payors to reduce healthcare system costs leading to (i) increasing outsourcing of L&T tasks by the healthcare industry and (ii) shift of care delivery towards decentralized (outpatient) models

(continued on next page)



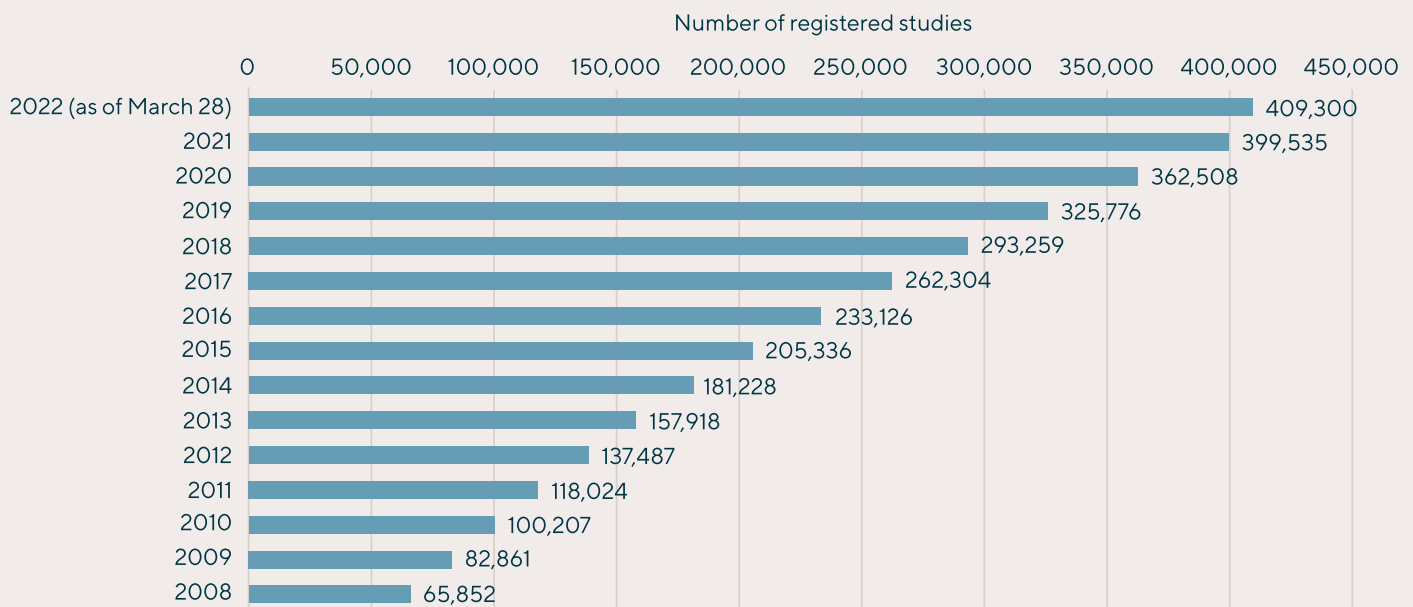
Segmentation by customer groups and type of goods

The healthcare sector represents an aggregation of actors which provide medication, devices and services to treat patients. It includes the production and commercialization of (bio)pharmaceutical products and services lending themselves to maintaining and re-establishing health. Given the varying logistics requirements for such medicines and devices, it is typically segmented into logistics and transportation related to pharmaceuticals and medical devices.

Pharmaceutical logistics can be further segmented into clinical trials logistics and logistics associated with finished medicinal products and pharma/ bio-science production:

Clinical trial logistics and transport are characterized by large volumes of highly valuable consignments. The segment is highly demanding in terms of service levels which result in shippers being comparatively price insensitive. The segment is mainly addressed by express services and contract logistics. Specific capabilities required to address this market comprise dedicated temperature-controlled vehicles for express last-mile services as well as air freight hub facilities. The role of data management and of temperature control are considered as highly distinctive in serving trials logistics. Overall, clinical trial logistics benefit from strong expected growth of pharma research and development (R&D) in order to secure long-term revenue growth for pharma producers.

Total Number of Registered Clinical Studies Worldwide Since 2000 (as of March 2022)*



Description: Clinical studies are an important part of drug development globally. The number of registered clinical trials has increased significantly in recent years. As of March 28, 2022, there were over 409,000+ clinical studies registered globally. The number of clinical studies has increased significantly since there were just 2,119 registered in 2000. In general, clinical trials have grown more complex in recent years and remain vital for the research and development of new drugs and products.

Note(s): Worldwide: as of March 28, 2022;

***Total number of studies registered on ClinicalTrials.gov since 2000, based on the First Received date. The first of ClinicalTrials.gov was made available to the public on February 29, 2000.**

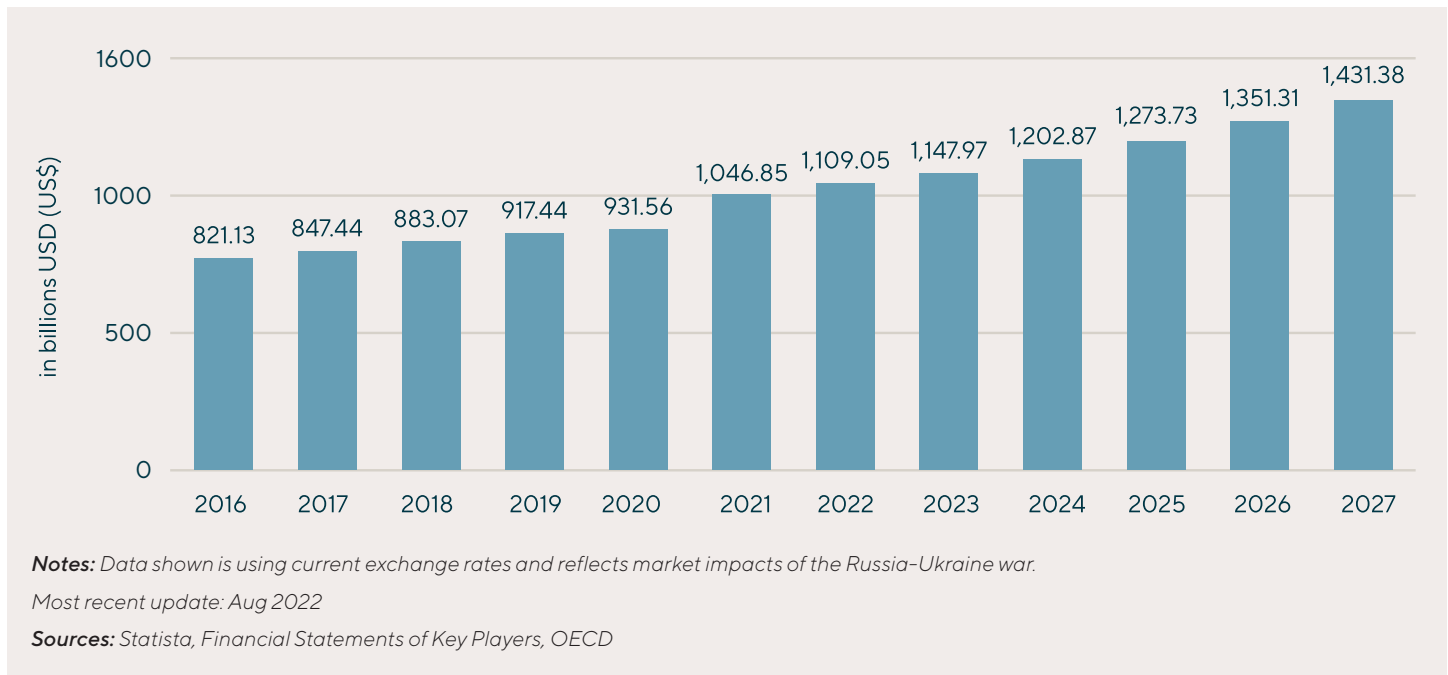
Source(s): ClinicalTrials.gov

(continued on next page)

For **pharma / bioscience production**, air freight continues to be the leading form of transport in global supply chains. However, over the road transport is also fundamental within markets. As pharmaceutical supply chains are very global in nature, Ti estimates that air freight accounts for around 50-70% of pharmaceutical tonnage. Growth in the biopharmaceuticals market drives strong demand for temperature-controlled logistics services as biopharma producers seek to expand distribution networks. This in turn drives demand for temperature-controlled and GDP-compliant storage, value-added services and transport solutions across various geographies.

- The global supply chains for COVID-19 vaccines, established less than 2 years ago, highlight the critical importance and growth potential of cold chain logistics. Pfizer’s product, for example, must be transported and stored at minus 70 degrees Celsius. As a result, major 3PLs built and/or expanded freezer farms as well as hubs with temperature-flexible capacity worldwide.
- Strongly increasing clinical trials and approvals for cell and gene therapy are expected to create highly interesting growth opportunities in cold chain logistics markets worldwide; the storage and transport of cells, tissue and biological samples also typically requires extreme low temperatures. Key healthcare players such as PharmaCos, IDNs and pharmacies are expected to compete in this emerging market segment; they will need LSPs to provide flawless supply chain solutions in order to deliver the first class “customer experience” that patients and payors expect while also being cost-efficient.

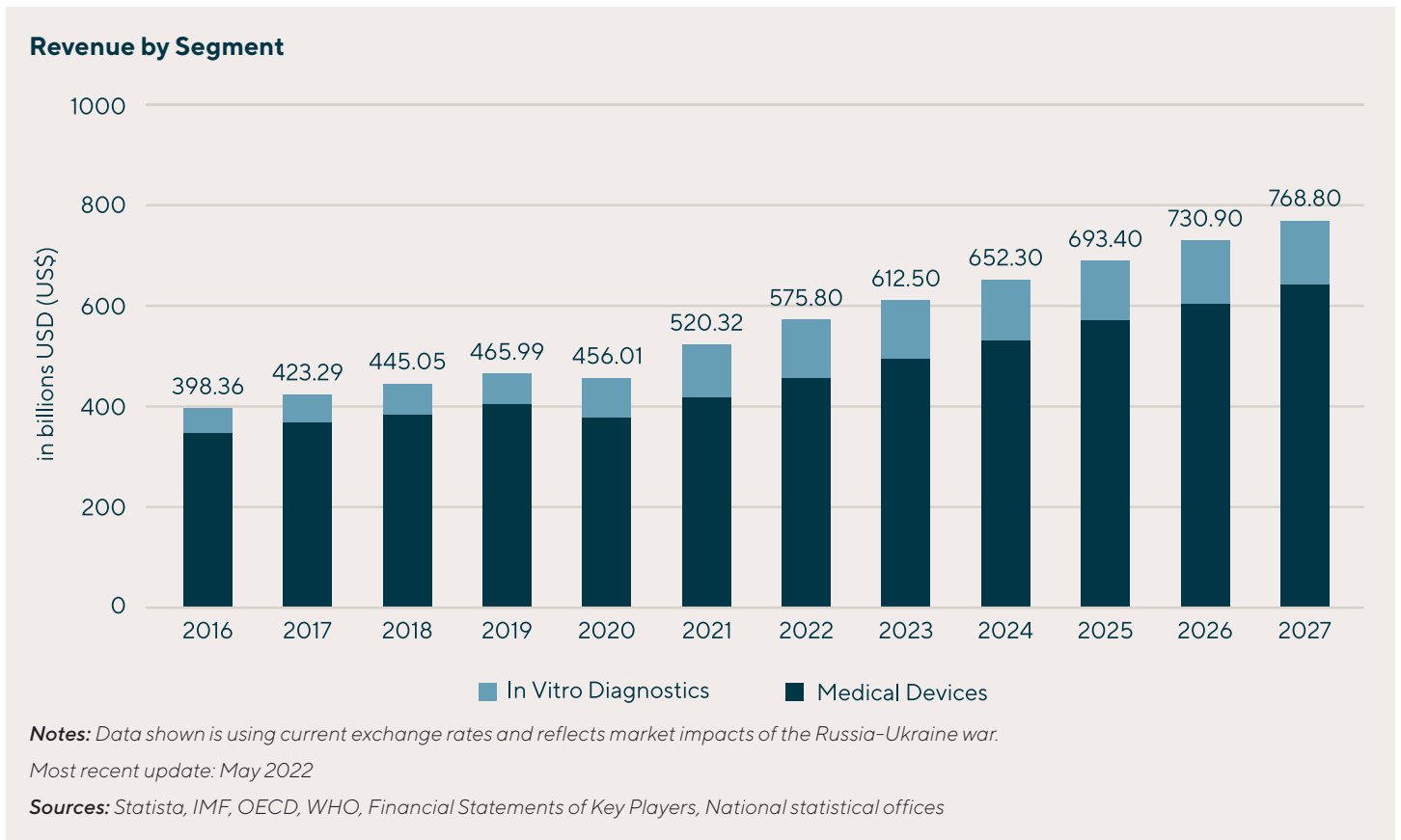
The emergence of **precision and prevention medicines** is further driving demand for both temperature-controlled as well as time-controlled distribution services. Such precision and prevention medicine products include blood and plasma products, biomarker testing, specific vaccines, oncology products, cellular therapies and regenerative medicine in the form of stem cells.



(continued on next page)



Logistics and transportation services related to medical devices are also expected to experience double digit growth rates inter alia reflecting the aging population, increasing focus on personalized medicine by using health trackers and remote patient monitoring devices as well as efforts to increase supply chain resilience. However, it has to be noted that the logistics requirements for supplying medical consumables and hospital supplies vary significantly from supplying and maintaining expensive medical equipment and technology. Transport as well as contract logistics and value-added services relating, for example, to modern imaging technology require special expertise around customized equipment packaging, assembly, installation and testing services as well as competencies in spare parts and reverse logistics.



(continued on next page)

Healthcare 3PL is an ideal segment for PE consolidation

The healthcare logistics and transportation industry combines a number of characteristics that continue to make it a highly promising area for PE investors to deploy a buy and build strategy on a regional or global basis. These main characteristics comprise the following factors:

Highly resilient and favorable long-term, end-market trends

The healthcare logistics and transportation services market is generally characterized by stable growth with minimal cyclicality due to (i) the inelastic nature of demand, (ii) favorable trends across the various end-markets; (iii) increasing regulatory requirements on pharmaceutical warehousing, transportation and monitoring and (iv) an increasing number of products that require more specialized storage and transportation services, including biopharma and vaccines as well as medical devices. In addition, increasing demand also stems from the outsourcing of in-house supply chain activities of healthcare and pharma manufacturers in order to focus on other strategic priorities such as sales and marketing and R&D while also minimizing costs and capital investments.

Significant barriers to entry due to high certification requirements

Healthcare logistics and transportation providers typically enjoy strong barriers to entry due to the importance that clients (as well as regulators and patients) are placing on certification and uncompromising adherence to the regulatory standards applicable across the different end-markets (GDP, Transported Asset Protection Association (TAPA), narcotics handling certification requirements in pharma or the ISO 13485:2016 certificate for services relating to medical devices).

Differentiation via specialized capabilities and reputation drives strong customer stickiness and high margins

Logistics service providers (LSPs) in the healthcare logistics and transport industry serve manufacturers, wholesalers, distributors and other organizations to provide supply chain management solutions for a range of products, including pharmaceuticals, biologics, narcotics, consumer health, animal health and medical devices. The key purchasing criteria for this customer group relate to reputation and reliability of the LSP as well as access to specialized and integrated capabilities and networks required to adhere to exacting regulatory standards in many healthcare end-markets plus excellence in quality management. Given the importance of the above-mentioned factors including quality and regulatory compliance, LSPs in healthcare logistics and transport tend to benefit from long-term, stable client relationships often underpinned by multi-year contracts while experiencing above average customer price insensitivity. As a result, providers of healthcare logistics and transportation services have the potential to achieve double digit operating margins on a sustainable basis.

High degree of industry fragmentation offers ongoing consolidation opportunities

Market participants in healthcare transport and logistics comprise all major global 3PLs and integrators. In addition, the industry comprises a large number of often regional courier and express companies, forwarders, warehousing providers, value-added healthcare distributors and pharmaceutical wholesalers as well as special network operators leaving ample room for inorganic market consolidation. There continues to be a growing opportunity to acquire smaller players as these enterprises (i) face succession issues, (ii) the need to invest into next generation digital tools and warehouse automation technology, or (iii) customers requesting the extension of service levels or wider geographic coverage in combination with regulations becoming more stringent.

This setting allows PE funds to execute focused-platform strategies to build portfolio companies that offer specialized capabilities in the healthcare logistics and transport industry and are of critical size on national and / or international levels, thereby creating attractive targets for global strategics or larger PE funds.

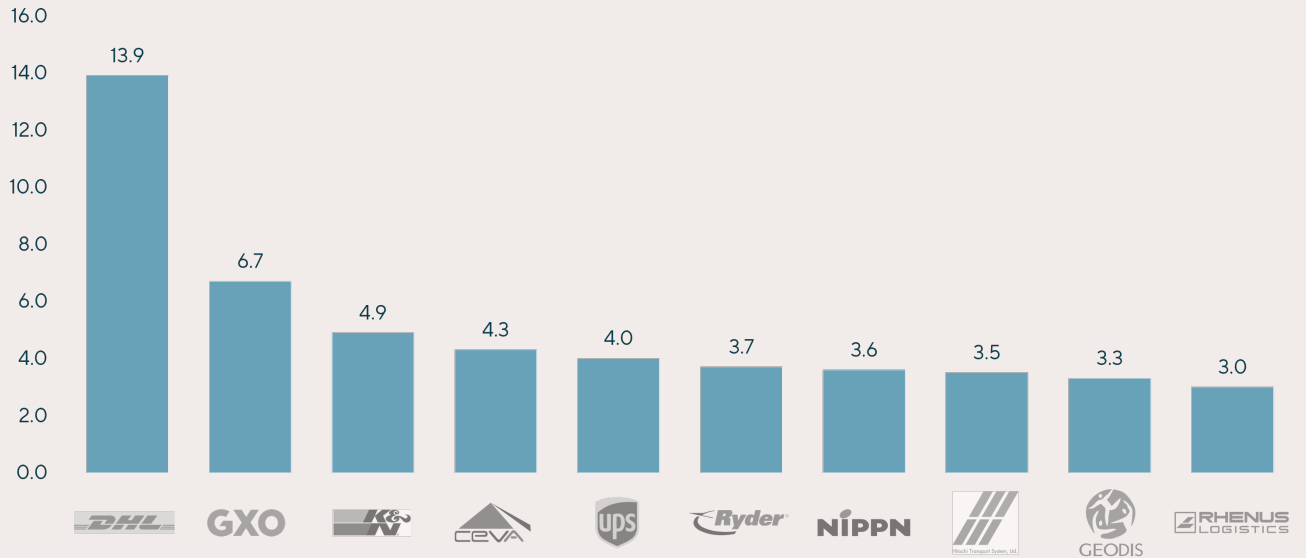
(continued on next page)

Wide range of strategic exit options to leading global and leading regional 3PLs

Focused providers of healthcare logistics and transport services are highly sought after by mid-size as well as by global 3PLs and integrators alike. Therefore, PE platform strategies in this subsector tend to benefit from a plethora of potential strategic exit options.

This is inter alia illustrated by the observation that nine out of the global top-10 contract logistics service providers are active in the healthcare and pharma vertical:

Revenue 2021 (Euro bn) and Top 10 global contract logistics / sub-vertical presence



Vertical	DHL	GXO	K&N	CEVA	UPS	Ryder	NIPPON	Hitachi Transport Systems, Ltd	GEODIS	RHENUS LOGISTICS
Agriculture	✓	✓				✓	✓			
Auto	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Chemical	✓	✓						✓		✓
Consumer/Retail	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
E-commerce	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Energy	✓			✓		✓	✓			
Healthcare/Pharma	✓	✓	✓	✓	✓	✓	✓		✓	✓
High Tech	✓	✓	✓	✓	✓	✓		✓	✓	✓
Industry	✓	✓	✓	✓		✓			✓	✓

Global 3PLs and integrators experienced significant success especially in the pharma vertical also during the pandemic and most of them have outlined healthcare and pharma as a strategic priority for both organic as well as mergers and acquisitions (M&A)-driven expansion as illustrated by the selected examples below:

- Hitachi Transport Systems strives to expand its pharmaceutical logistics operations globally; as part of that strategy, the company announced the planned acquisition of Dutch freight forwarder Cyber Freight International at the end of September 2022.
- UPS is pursuing a dedicated healthcare logistics strategy which includes the recently announced acquisition of Bomi Group in August 2022, which will strengthen its footprint in Europe and Latin America. Including Bomi Group, UPS will have doubled its healthcare distribution space globally since 2020 to more than 15 million square feet.

(continued on next page)

- DHL also continues to be an active consolidator in the healthcare logistics space and announced the acquisition of New Transport Applications in August 2022, a Mexico based provider of logistics services to the pharmaceutical and healthcare sector.
- Geopost, which has also declared healthcare logistics as a strategic growth area, acquired BK Pharma Logistics in the Netherlands in 2021.
- Geodis acquired temperature-controlled contract logistics provider Gandon Transport in 2021 order to strengthen its pharmaceuticals distribution capabilities.
- Kuehne+Nagel announced a strategic partnership with Jointown International, China's largest non-state-owned pharmaceutical distribution company, to accelerate its footprint in pharma and healthcare logistics in China in 2021

Supporting our thesis about the continued attraction of healthcare logistics for financial sponsors are examples of investments in the sector such as:

- Fulcrum Equity's investment in US lab supply chain specialist Path-Tec (exit via merger with Lab Logistics);
- The Jordan Company with Quick International Courier, a time-critical transport services inter alia specializing in pharmaceuticals and clinical trials transports (exit via sale to Kuehne+Nagel);
- Siparex' participation in Plurima, an Italian hospital logistics and medical data management services provider (exit via sale to Poste Italiane);
- Compass Group Equity Partners' investment in The Allied Group, a fulfillment services provider to healthcare and life sciences organizations worldwide (exit via sale to Lab Logistics);
- ArchiMed's buy-and-build strategy for Italy-based healthcare logistics provider Bomi Group (exit via the above described sale to UPS);
- Navis Capital Partners investment in B-Medical Systems, a temperature-controlled storage and transportation company (exit via sale to Azenta Life Sciences);
- Triton's take private of Clinigen Group, which offers specialist services across the pharmaceutical product lifecycle, from clinical trials to commercialization of medicines;
- EQT Private Equity and Mubadala acquiring Envirotainer, a Swedish specialist for temperature-controlled containers used for air transportation of temperature-sensitive healthcare products;
- Linden Capital Partners' minority investment in Lab Logistics, a US provider of supplies, kitting and asset-light same day logistics solutions, exclusively focused on the medical laboratory and hospital industry.

For other perspectives, please visit us at www.lincolnternational.com/perspectives

Interested in learning more? Get to know Lincoln's Business Services Group at www.lincolnternational.com/business-services.

