Company Analysis

Syngene International Ltd

Unfolding the CRAMs Business....

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Industry Overview

Contract Research and Manufacturing Services (CRAMs) refers to outsourcing services to low-cost providers like India which maintains quality, world class standards and meets international regulatory norms like the USFDA.

CRAMS offer outsourced services to support New Molecular Entity (NME, which are compounds that emerge from the process of medicine discovery, that are not a version of an existing, previously investigated/approved substance) discovery, development and manufacturing for R&D driven organizations across industrial sectors like pharmaceuticals, biotechnology, nutraceuticals, animal health, agro-chemicals.

CRAMs is one of the fastest growing sectors in pharmaceutical and biotechnology industry. The pharmaceutical market uses outsourcing services in the form of Contract Research Organization (CROs) and Contract Manufacturing Organizations (CMOs).

Expected Market Growth

North America

- Market Size 2018: $24.7 Bn
- Market Size 2025: $34.4 Bn
- CAGR: 4.8%

Middle East & Africa

- Market Size 2018: $4.4 Bn
- Market Size 2025: $6.4 Bn
- CAGR: 5.5%

Asia Pacific

- Market Size 2018: $44.1 Bn
- Market Size 2025: $80.1 Bn
- CAGR: 8.9%

Europe

- Market Size 2018: $16.5 Bn
- Market Size 2025: $22.9 Bn
- CAGR: 4.8%

Latin America

- Market Size 2018: $9.0 Bn
- Market Size 2025: $13.9 Bn
- CAGR: 6.4%

Source: IIC

Driving the Growth....

Most pharmaceutical and biotechnology companies outsource at least part of their manufacturing. Historically, large companies that are inclined to manufacture in-house do so primarily to maximize their return on investment in facilities and capital by operating at maximum capacity. However, because of the unpredictability of the drug development pipeline, sizing a plant to maintain maximum capacity is challenging.

To reduce risks, a growing number of drug companies outsource some of their manufacturing to outsourcing companies. Such partnering arrangements enable companies to manage surges in capacity needs without tying up assets during slower periods. In addition, smaller companies often do not have the resources or capital to invest in process development and manufacturing facilities, and thus tend to outsource more of their manufacturing costs.

The rising costs and regulatory pressure in developed markets are forcing many global pharmaceutical companies to reduce their internal capacities in research and development (R&D), and manufacturing, and turn to CRAMS, and outsourcing of research and clinical trials to developing countries.These strategies help multinational companies reduce costs, increase development capacity, and focus on their core profit makings activities rather than on manufacturing.

India, with a large patient population and genetic pool, is fast emerging as a preferred destination for such multinationals seeking efficiencies of cost and time.The country's CRAM industry offers a significant cost-quality proposition, with potential savings of about 30-40 percent compared to western markets such as the US and Europe.Since the amendment to Patents Act in 2005, many Indian pharmaceutical companies have gradually moved away from generic production to the development of new drugs, exports to regulated markets and cooperative agreements with global pharma companies.

Advantage to India....

A US$33 billion opportunity, the pharmaceutical industry in India presents considerable potential for collaborative and outsourced R&D in drug development, biotechnology, chemicals, and manufacturing of medicinal products. India's CRAM sector is globally recognized for its high-end research services and is one of the fastest growing segments of the country's pharmaceutical industry.The country has a low cost of production, low R&D costs, innovative scientific man power, and a large number of national laboratories that have the potential to steer the industry ahead to a higher level.

Besides, India is the only country in the world that has the highest number of USFDA-approved plants for generic drug manufacturing outside the US. Some of the leading Indian pharma companies derive about 50 per cent of their turnover from exporting generic medicines to developed markets like the US and Europe.

Globally, there is a growing shift towards biologics (large molecules) from traditional small molecule. This is being driven by the commercial success of biologic drugs in the treatment of many serious and chronic illnesses such as rheumatoid arthritis, cancer, and diabetes.

"The global R&D landscape has transformed significantly over the last decade,with organizations outsourcing research activities traditionally performed in-house. Initially, cost advantage was the primary reason behind outsourcing decisions; at present, factors such as access to specialized knowledge and technologies, faster innovation, and increasing pressure of regulatory compliance, along with cost efficiency, are driving organizations to outsource their R&D functions to a specialist. With fast-evolving medical needs,impending patent cliffs, shrinking pipelines, pharmaceutical companies today increasingly invest in scientific innovation."

CRO Market

(Contract Research Organizations)

The global contract research organisation (CRO) services market is projected to grow at 7.6% CAGR from 2019-25 to reach a value of USD 61 Bn by the end of this period, according to a research report from Global Market Insights1.
While pharmaceutical and biopharmaceutical companies are the primary end-users of contract research services, estimated to account for 54% revenue share in 2018, companies in the realms of medical devices, consumer products, cosmetics, speciality chemicals and agrochemicals are also working with CROs for product innovation.

Research and development investments are increasing to meet the growing demand for new drug molecules for various therapeutic areas, the R&D model has witnessed a major shift over the past decade. CROs have emerged as a strategic alternative to in-house research and development as they help pharmaceutical and biopharmaceutical companies to control their R&D costs, manage stringent regulatory requirements, take strategic decisions based on research progress and outcomes, increase the speed-to-market of their life-changing drugs and focus on their core competencies.

CROs, through their ability to adapt and integrate advanced technologies and their teams of highly qualified scientists, can accelerate the development of a compound. This eliminates the client companies' need to maintain their own R&D space, equipment and manpower. Consequently, CROs have become the partner of choice for companies of all sizes, from global giants to smaller enterprises.

The oncology segment accounted for the largest share of revenue of the CRO market in 2018 and is estimated to record 7.5% CAGR during 2018-2025. This growth is predicted to be sustained as the increasing incidence of cancer drives demand for new drug development for disease treatment.

CMO Market

(Contract Manufacturing Organizations)

Pharmaceutical manufacturers are increasingly entering into strategic partnerships with contract manufacturing organisations in order to increase capacity, gain access to sophisticated technologies, and mitigate risk. For instance, in clinical dose manufacturing, there is a high risk of failure associated with pipeline drug products; using the services of a CMO reduces this risk for pharmaceutical companies that would otherwise need to invest in both the manufacturing equipment and facilities. Industry assessment indicates that CMOs are acquiring or developing capabilities of both API and dose manufacturing. A full-service CMO makes manufacturing seamless and reduces the client's dependence on multiple contract service providers.
Global data estimates that dose CMO contract revenue in 2018 was USD 21.4 Bn, representing a growth of 6.4% over the 2017 revenue of USD 20.1 Bn . This is the highest year-on-year growth since 2012 and represents a continued recovery from the low growth rate of 3.0% recorded for 2015.

Biologics Market

Industry has seen the emergence of the Biologics blockbuster in the past ten years. In 2018, only two of the top ten largest selling drugs were small molecules and biologics drove 80% of sales. Looking ahead, as Biologics lose their patent protection, Biosimilars are taking their place. The fast pace of growth of the biologics industry versus the insufficient internal capacity of biopharmaceutical companies has spurred them to outsource various parts of product development and manufacturing. The complexity of biologics, both in the development and manufacturing stages, and the specialised skills and equipment required for this, has led to CROs and CMOs becoming an integral part of the biologics industry. According to Grand View Research, the global biopharmaceutical CMO and CRO market size is expected to reach USD 37.8 Bn by 2025, 7.7% CAGR. Mammalian cell line-based bioproduction systems held the largest market share in terms of revenue in 2018.

Source: IIC | Recipharm

Key Trends in Industry....

Robust R&D Pipeline

- Today R&D pipeline is increased by 11% than 2018
- Oncology, Rare diseases leading the growth
- 70%+ of pipeline require advanced technologies

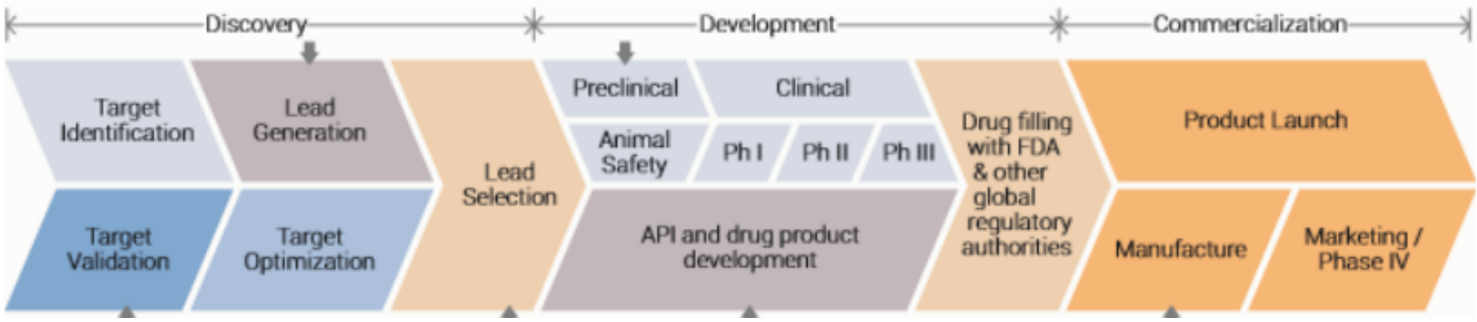
Outsourcing up

- Today outsourcing is increased by 8% than 2018
- Launches are frequently outsourced

Strong Biologics Growth

- Antibody pipeline, demand for high quality product capability
- Gene & Cell Therapy (use of genes and cells to treat disease)demand far exceeds supply

Value Chain



1.Discovery

The focus at this stage is to narrow down thousands of compounds to a few hundred, promising possibilities for further research and development. Researchers do this in various ways, including creating a molecule, using high-throughput screening techniques to select a few promising possibilities from among thousands of potential candidates, finding compounds from nature, and using biotechnology to genetically engineer living systems to produce disease-fighting molecules.
It covers the process from target identification to target validation to lead generation and lead optimization.
Some of the key steps in the NME discovery process are described below:

- **Target Validation:**
  It involves intensive in vitro (research performed out of living organisms), as well as in vivo (research performed in living organisms) studies after target identification that provide information on the effects of the pharmacological intervention.
- **Lead Generation:**
  The aim of this stage is to refine each hit series selected from Target Validation to try to produce more potent and selective compounds which possess properties adequate to examine their efficacy in any in vivo models that are available.
- **Lead Optimization and Selection:**
  This seek to identify and synthesize lead compounds.

2.Development

After the NME discovery, this stage narrows down thousands of compounds to a few hundred promising possibilities, these molecules enter the development stage. The development stage spans preclinical and clinical testing in addition to drug substance and drug product development.

The key stages in the process are described as below:

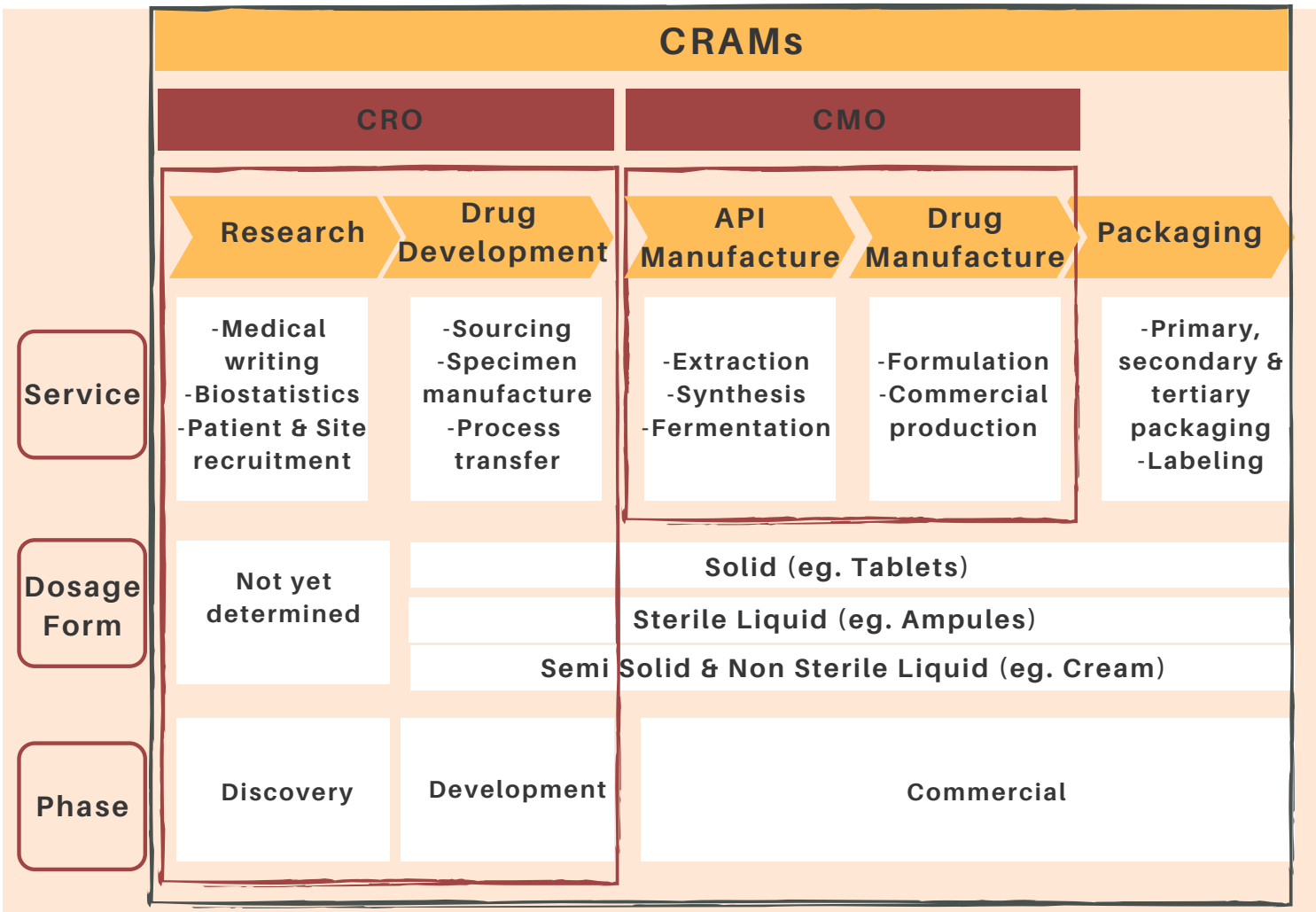
- **Preclinical Testing:**
  This step involves exhaustive laboratory and animal experimentation of the preclinical drug candidates for safety and therapeutic effect in order to determine whether a compound is suitable for human testing.
- **Clinical Trials:**
  Drug candidates approved by the relevant regulatory body are typically referred to as an Investigational New Drug Application (IND). INDs proceed to clinical trials.
  Broadly, clinical trials are studies in humans to determine the safety, efficacy and suitable drug dosage of potential drug candidates.
  - The major phases in clinical trials are described below:
    - Phase I
      Trials test a compound in a small group (e.g., 20 to 100) of healthy volunteers to determine the safety of the compound.
    - Phase II
      Trials test the compound in a somewhat larger group (e.g., 100 to 500) of volunteers who have the disease or condition the compound is designed to treat. They also determine the effectiveness of the compound, examine possible short-term side effects and risks, and identify optimal dose and schedule.
    - Phase III
      Trials test the compound in a much larger group (e.g., 1,000 to 5,000) of participants to generate statistically significant information about safety and efficacy and to determine the overall benefit-risk ratio.

The data generated here helps in evaluating the success or failure of the trial with respect to its predefined objectives.

3.Commercialization

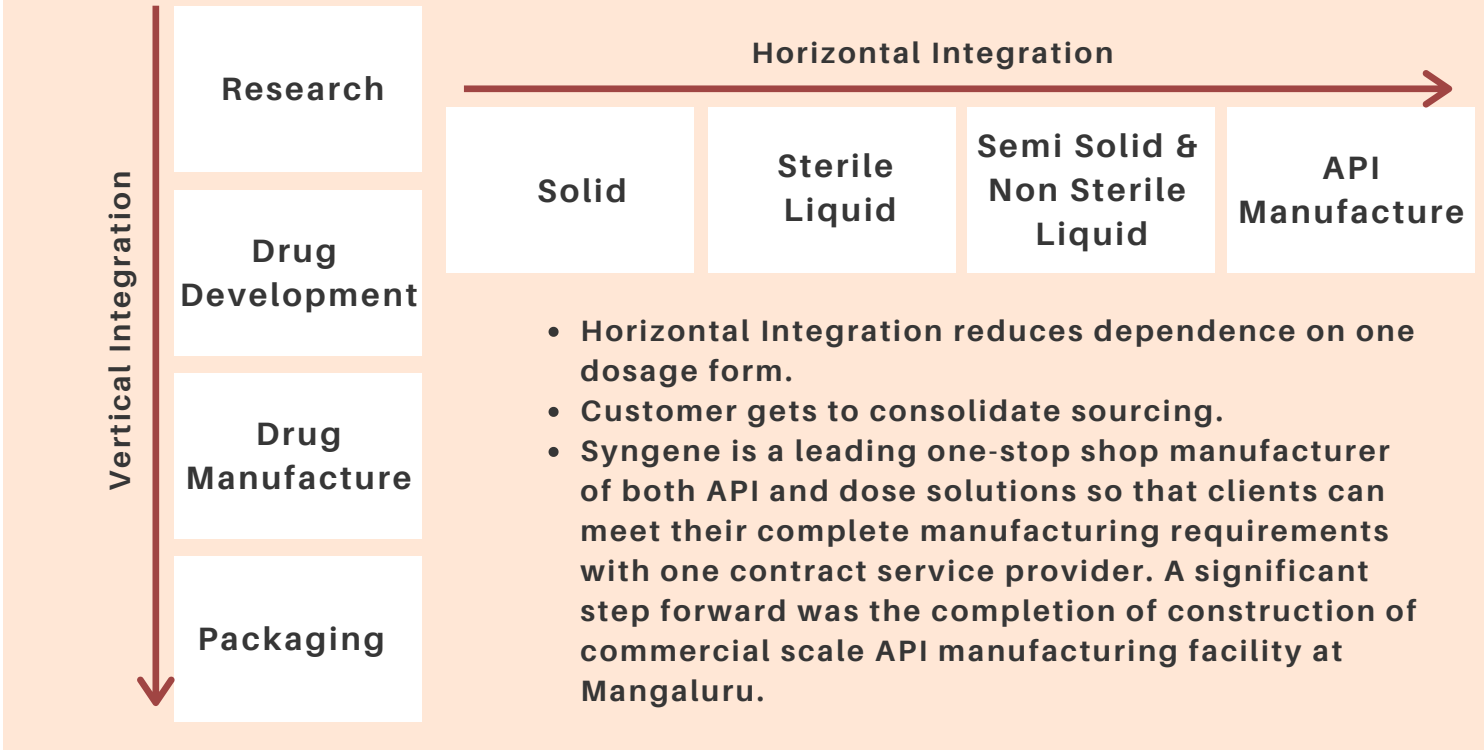
This includes manufacturing leading to commercialization (manufacturing and post-marketing follow-up studies on impact and side effects).
Consequently, manufacturing facilities must be carefully designed so that the commercialized product can be consistently and efficiently produced at the highest level of quality.
Accordingly, manufacturing facilities must be constructed to the high standards to ensure safety and quality in the manufacturing process. For example, pharmaceutical companies must adhere to FDA or other relevant regulations, and must upgrade facilities when new NMEs are approved.

Business Model



Source: IIC

Integration Options



- Horizontal Integration reduces dependence on one dosage form.
- Customer gets to consolidate sourcing.
- Syngene is a leading one-stop shop manufacturer of both API and dose solutions so that clients can meet their complete manufacturing requirements with one contract service provider. A significant step forward was the completion of construction of commercial scale API manufacturing facility at Mangaluru.

Source: IIC

Customer Partnerships

	Opportunistic	Strategic			
Depth of Partnership	Fee for Service	Reserved Capacity	"Condo" Model	Joint Venture	Global Enterprise
	Access to capacity on as-needed basis	Contractual guarantee of access to specific capacity (scientists/R&D centres) for agreed upon time	Dedicated manufacturing suite at an existing facility	Co-investment with CMO partner to expand the facility	Co-investment in new assets with CMO partner to gain access to its global network
Type of Payment	Set fee with no volume based discounts	Cost per batch or cost per batch plus suite fee	Suite (Package) fee or suite fee plus cost per batch	Varies, could include upfront cots, fixed annual suite fee, or unit cost per batch	Joint investment
Best For	Products with low volume, demand or margins, late stage products, managing short term capacity shortages	Production with predictable demand	High volume production	Emerging market or regions with expected near or medium term increase in demand	Products with varying market demand or mature external supply integration
Possible Risks	Fixed volume could create under or over supply	More relationship management	Additional investments to cover unexpected increase in volume or product	Substantial capital investments and more oversight	Large capital investments and more oversight

Source: IIC

Porter Analysis

Threat of Substitute

- Technology investments
- Capabilities & Capacities
- Sticky Business
- High Budget especially cost of Scientists

LOW

Threat of New Entry

- Huge investments
- High Regulations
- Long term Customer Partnership
- Reliability

LOW

Bargaining Power of Buyers

- Niche Technology investments
- Intellectual Properties

MEDIUM TO LOW

Bargaining Power of Suppliers

- Difficult to switch
- Sticky Business
- Regulatory Compliance

LOW TO MEDIUM

Industry Rivalry

- High Regulations
- Sticky Business
- Regulatory Compliance

LOW TO MEDIUM

Factors to Check

Positive

- *Increasing Pharma, Speciality Chemicals outsourcing*
- *Technology Advancements*
- *New Operational Techniques*
- *Faster Research at Lower cost*
- *Help Big companies to convert their Fixed cost into Variable*
- *Good Regulatory Compliance track record*
- *Scale-Up Infrasturcture by adding R&D centres or Manufacturing plants*
- *Client Centric mindset*
- *Adequate Human Capital Investments*
- *Supply Chain reliability*
- *Confidentiality of IP*
- *Strong Customer Relationships*
- *Strong Financials to support Infrastructure required*

Negative

- *Any harm to client's IP protection*
- *Breach of Regulatory Compliance*
- *Supply Chain disruptions*
- *Lack of Skilled Labour (Scientists)*
- *High Customer Concentration*
- *Innovator pausing or suspending development*
- *Termination of Customer Relationship*
- *Lack of Specialized Knowledge*

Company Overview

Company is one of the leading India-based CRAMs,offering a suite of integrated, end-to-end discovery and development for Novel Molecular Entities (NMEs) and manufacturing services across industrial sectors including Pharmaceutical, Biotechnology, Agrochemicals, Consumer Health, Animal Health, Cosmetic and Nutrition companies.

It was incorporated in 1993 and is headquartered in Bengaluru, India. It is a subsidiary of Biocon Limited, a global Biopharmaceutical enterprise.

Key Highlights

- 362 Clients
  ~90% Revenues from Exports
- 62 Long-term Clients (Collaborations extending over 5 years or more)
- 4240 Scientists (85% Employees of total head count are Scientists)

Some of the Clients

GSK, Herbalife, Pharma Aust, Amgen, Artelo Bio Sciences, Merck KGaA, Baxter Int, Bristol Myers Squibb, Zoetis Inc, Zumutor Biologics

Geo-graphic Client Break-up

- 76% US
- 5% Japan
- 4% India
- 12% Europe
- 3% ROW

Journey

1993

-Initiated Operations as CRO with services in Chemistry & Biology

1998

-Granted 100% Export Oriented Unit by GOI

1999

-Achieved 1st Operation expansion in R&D with lab space increased to over 23,000 sq.ft.

2001

-Forayed into Chemical development with a dedicated manufacturing facility

2003

-Moved to Biocon SEZ, a 90 acre bio - pharmaceutical SEZ with operations spread over 65,000 sq.ft.

2007

-Signed a contract with Bristol Myers Squibb for setting up first dedicated R&D centre
-Expanded Infrastructure to 148,000 sq.ft.

2009

-Expanded manufacturing services with a new CGMP (Current Good Manufacturing Practice)plant
-Initiated operations in Safety Assessment Services, Formulation & **Biologics** Development services

2011

-Collaboration with Endo Pharma USA to develop Novel Biological Therapeutic Molecule against Cancer

2012

-Established Abbott's 1st nutrition R&D centre in India
-Received ANVISA certification for Clinical facilities
-Acquired 100% stake in Clingene Int, a clinical research company

2013

-Established dedicated R&D centre for Baxter Int.inc.
-Syngene Control Testing Lab accepted by DHHS & USFDA

2014

-Extended collaboration with Bristol Myers Squibb for its dedicated R&D centre till 2020
-Syngene API manufacturing facility accepted by DHHS & USFDA
-Established another 75,000 sq.ft. centre

2015

-Listed on NSE & BSE
-***Clingene amalgamated with Syngene***

2016

-Expanded into Bioinformatics & NGS services
-Established dedicated R&D centre for Amgen.Inc

2017

-Collaboration with Zoetis to develop & manufacture animal medicines
-Broadened research with Amgen.Inc
-Established Herbalife's 1st nutrition R&D centre in India & Extended collaboration with Bristol Myers Squibb till 2026

2018

-Extended collaboration with Baxter Int.inc. till 2024
-Received PDMA accreditation
-Signed R&D agreement with GSK to advance drug discovery in multiple theraputic areas

2019

-Signed an agreement with Biotechnology Industry Research Assistance Council, a GOI undertaking, for setting up a centre for Adanced Protein Studies

Business Model

Business Units

Dedicated R&D Centres

Company sets up customized R&D centres with dedicated infrastructure and scientific teams for specific clients
FTE Contracts

Discovery Services

This unit comprises chemistry, biology, Integrated & Therapeutic Antibody Drug Discovery and **Research Informatics** services for both small and large molecules.
FTE Contracts

Development Services

Encompasses services to a drug once it moves beyond in-vivo testing to preclinical studies and clinical development.
It includes process development and manufacturing of molecules for clinical supplies, regulatory batches and initial commercialization.
FFS Contracts

Manufacturing Services

Manufacturing services for small and large molecules, for clinical supplies and registration batches as well as commercial volumes through a new, state-of-theart API manufacturing plant and a disposable biologics manufacturing facility.

Research Informatics

While processing chemicals or biologics, one of the challenges is to find the right choice of parameters that would yield the required drug profile. This was earlier being determined only by the trial-and-error method, which meant a number of time-consuming laboratory experiments.
Syngene developed a mathematical model to conduct virtual trials and find the optimal parameters to produce the required drug profile.
The model suggests smarter short-cuts to limit the number of trials needed to converge to the required end-results.
It is basically a combination of Biology and Information Technology (AI).

Company has entered into a collaboration with a French Biotech company to develop and commercialize a novel using Bioinformatics

Dedicated R&D Centres

Bristol Myers Squibb	Baxter	Amgen	Herbalife
-Largest R&D centre in Asia from 2009 extended till 2026 - 550 scientists supporting novel small and large molecule R&D -Produced >10 drugs candidates for further study and advanced new compounds for first-in-human studies	-Dedicated R&D Center in India for Baxter from 2013 extended till 2024 -Engages multidisciplinary team of 200 scientists -R&D activities centred on product and analytical development, preclinical evaluation in parenteral nutrition and renal therapy	-Exclusive R&D Center for Amgen Inc. in India (2016) -Supporting variety of discovery & development for biotechnology and small molecule -Engages multidisciplinary team of 170 scientists	-Herbalife's 1st Nutrition Research and Development Lab in India (2016) -CGMP formulation lab to support product testing, sampling and end-product development

Contractual Agreements

Full-time Equivalent (FTE)

- Here company typically bills based on the number of scientists deployed.
- In long-term contracts, clients agree to a minimum utilization of a specified number of scientists, which company dedicates to that client's work. The scope of services and deliverables generally evolve over time. Company also agree to absorb a certain quantum of material costs in FTE contracts, and then charge any additional spends on materials to client.
- FTE contracts are generally renewable annually.

Fee-for Service (FFS)

- FFS contracts are short-term in nature.
- In FFS contracts, company generally agrees to fixed prices for agreed services within a defined scope.
- While company may seek additional payments for work required outside the defined scope.
- Company bears the risk of cost overruns for work within the scope.

Canvas

Key Activities

- R&D
- Converting Client's fixed cost into variable
- Infrastructure building
- Supply chain integration
- Regulatory compliance
- Upgrading technologies
- IP protection

Value Proposition

- Dedicated R&D centres
- Discovery of molecules and its development and manufacturing
- Reduce time to market
- Specialised knowledge provider
- High technology based operations
- One stop shop for Big pharmas
- Reduce Opex and Capex for Big pharmas

Key Partners

- Scientists
- Regulatory bodies
- Patients/Physician

Customers

- Baxter
- Amgen
- Herbalife
- Bristol Myers Squibb
- Merck KGaA
- GSK
- Zumutor Biologics, etc

Revenue

- FFE
- FFS
- Combination of both
- CMO (newly expanded)

Key Resources

- R&D centres
- Manufacturing facilities
- Scientists

Costs

- Scientists salary
- Interest cost
- Maintenance costs

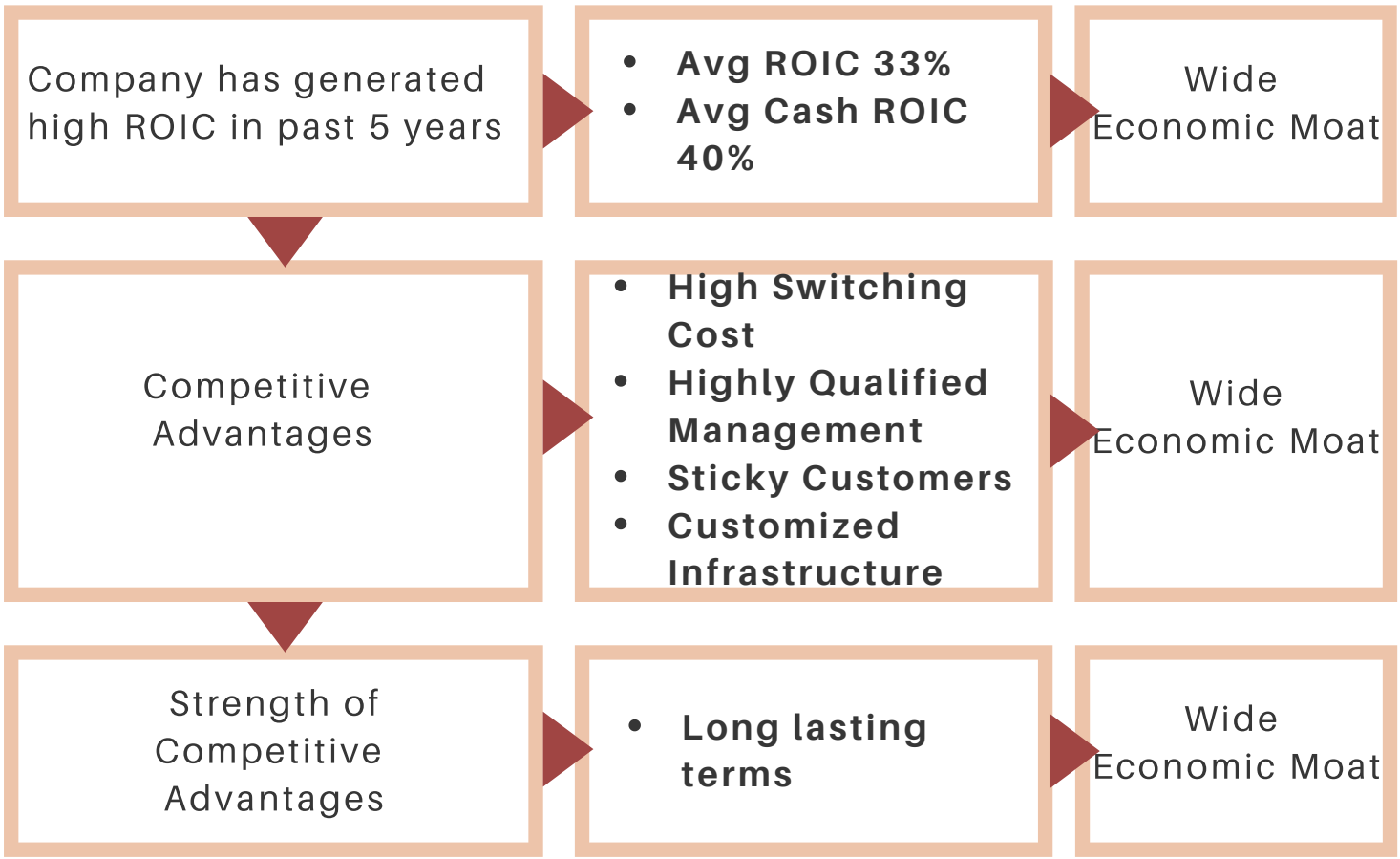
Key Relations

- Clients

Channels

- Long term & short term contractual agreements

Moat Analysis



Key Insights

- Company has started using Single-Use Bioreactors instead of Stainless Steel in their operations which are basically disposable reactors. The advantage is that company does not need to do lot of cleaning consistently which helps in improving turnaround time, also manufacturing becomes much cleaner with least chance of contamination in drug.

- Syngene's billing rate in India per scientist is 60k USD whereas China's per scientist rate is 90k-100k USD and Western Companies' per scientist rate is 175k USD. (Hence India is cheaper in terms of costs to provide services)

- CMO Space Expansion: Their new Active Pharmaceutical Ingredient (API) manufacturing facility in Mangaluru will bring an additional boost to commercial-scale manufacturing for small molecules.

- During FY20, company invested a total of Rs. 756 cr in ongoing capex programmes. Of the total capex, 40% was in the commercial API manufacturing facility, 26% in Discovery Services, 11% in a Biologics manufacturing facility and 23% in the Dedicated Centres and Development Services.

- It is noteworthy that 100% of the capex during the year was self-funded. Despite this, our net cash position increased to Rs. 362 cr as on March 31, 2020 as against Rs. 339 cr as on March 31, 2019.

- New customers initially take time and give small orders and once they are confident about Syngene, they increase the orders. This process of increasing business with clients which use to take 5 to 10 years has reduced to 3 years with new customers.

- For once CRO services can be suspended in cases like COVID-19, but CMO is unstoppable.

- Company has a strong highly experienced management team with MD Kiran Mazumdar Shaw. Company has a VP. Dr Kenneth Barr who is Ph.D. in Synthetic Organic/Organometallic Chemistry from Massachusetts Institute of Technology and this university has increased its stake to 0.59% in FY'20 from 0.35% in FY'19.

- Stake of Massachusetts Institute of Technology explains that the role of technologies like Machine Learning and Artificial Intelligence have started playing an important role in New Drug Discovery. Very few companies in Asia have this kind of end to end capability from concept to commercial scale manufacturing.

- It has a wholly-owned overseas subsidiary in the United States (Syngene USA Inc.) which allows clients to have local access to its business development teams.

- It usually price contracts in U.S. dollars and incur costs in Indian Rupees. (Hedging rate for the quarter - Rs.73/USD)

- With many of their facilities in Bengaluru operating within a SEZ, Syngene enjoys tax benefits from the Indian Government.

Management

Kiran Mazumdar Shaw
Non-Executive Chairperson

Ms. Shaw is a first-generation entrepreneur with over 45 years of experience in the field of biotechnology. She is a recipient of 'Padma Shri' and the 'Padma Bhushan' awards. She was also conferred with the highest French distinction – Chevalier de l'Ordre National de la Légion d'honneur. in 2016. She is ranked #1 in the Business Captains category in Global 'Medicine Maker Power List' 2018. She was honoured with the Order of Australia, Australia's highest civilian award and was named EY Entrepreneur of the year for India in 2019. She is also the Chairperson of Biocon Limited, Independent Director on the Board of Infosys, United Breweries Ltd and Narayana Hrudayalaya.

Jonathan Hunt
MD and CEO

Mr Hunt has an MBA from Durham University, United Kingdom, with over 30 years of experience in the global biopharmaceuticals industry. At Syngene, he is responsible for leading the Company's business operations and steering its investments in eveloping and strengthening its capabilities and capacity. Prior to joining Syngene, he held leadership positions at AstraZeneca for over a decade, including President and Director of AstraZeneca, Austria, and President and Chief Operating Officer, AstraZeneca, India.

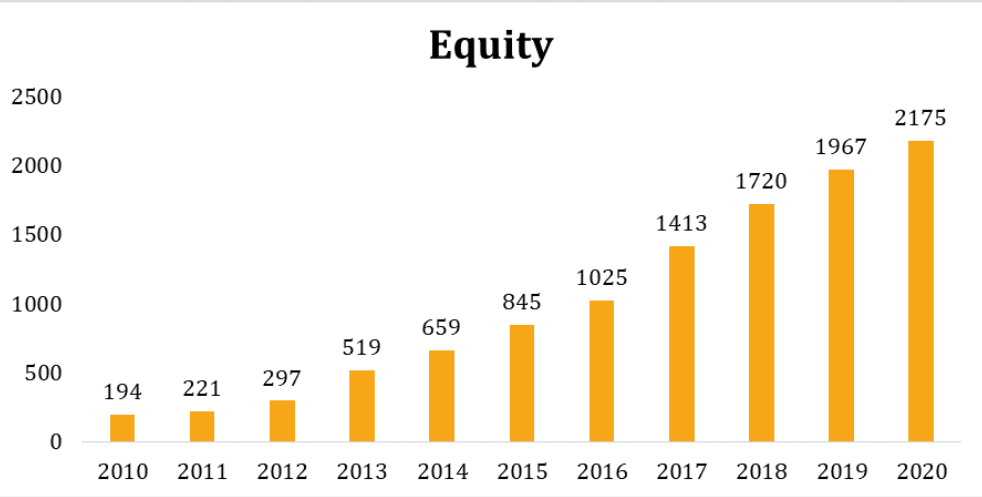
Sibaji Biswas
Chief Financial Officer

Mr Biswas is a certified CFA from ICFAI and holds a B.Tech from IIT-Kharagpur. With an MBA from University of Calcutta he has also completed Management Development Programs at the Indian Institute of Management (IIM), Ahmedabad and London Business School. He has over 20 years of extensive experience in finance and related functions. His prior experience includes working with Vodafone (Romania), Vodafone (India),Hutchison Essar Limited, Fascel Limited, and the ABP Group. Prior to joining Syngene,he was the CFO and a member of the Board at Vodafone (Romania). At Syngene,he oversees the finance, supply chain,legal, secretarial and IT functions and as member of the Executive Committee, he plays important role in driving Strategy.

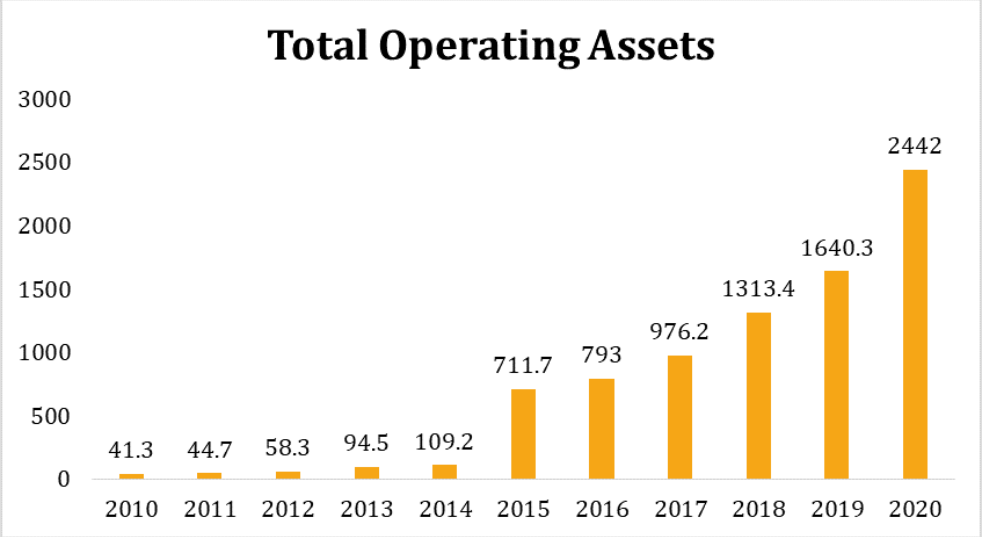
Dr Mahesh Bhalgat
Chief Operating Officer

Dr Bhalgat holds a Ph.D. in Medicinal Chemistry from the University of Utah, United States, and a bachelor's degree in Pharmacy from the University of Mumbai. He has over 25 years of experience in both biotechnology and biologics. Dr Bhalgat has worked in different areas of R&D including analytical development, technology transfer, regulatory sciences and quality. During his career, he has been associated with companies such as Celera Genomics, Molecular Probes, Monsanto and Amgen. Prior to joining Syngene, he was the Chief Operating Officer at Shantha Biotechnics, a Sanofi company, where his responsibilities included operations and long-term strategic planning and development. He is responsible for operational efficiency, safety, quality and compliance.

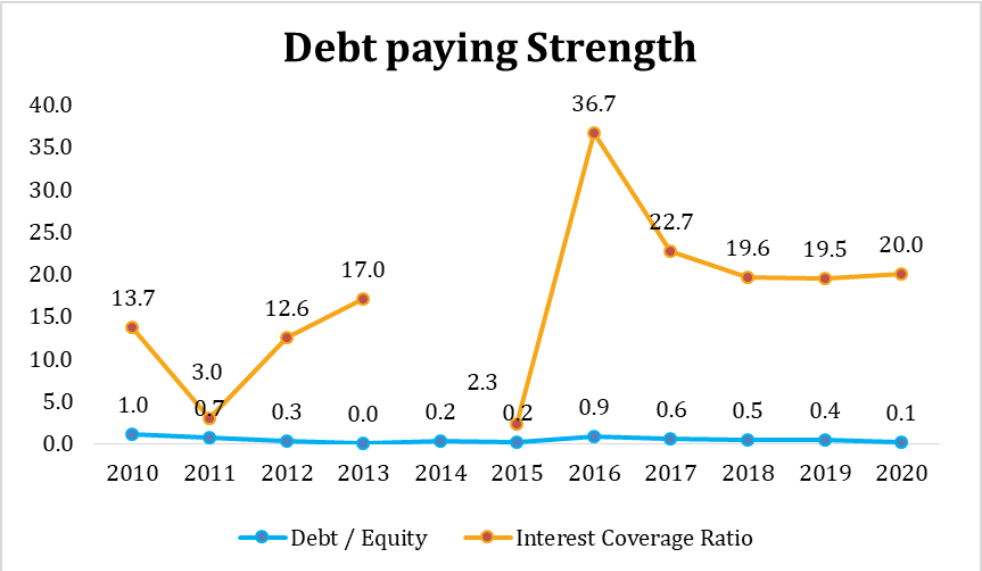
Financials



Company has increased its Equity over the years creating value for Shareholders at a compounded annual growth rate of 25% in last 10 years.

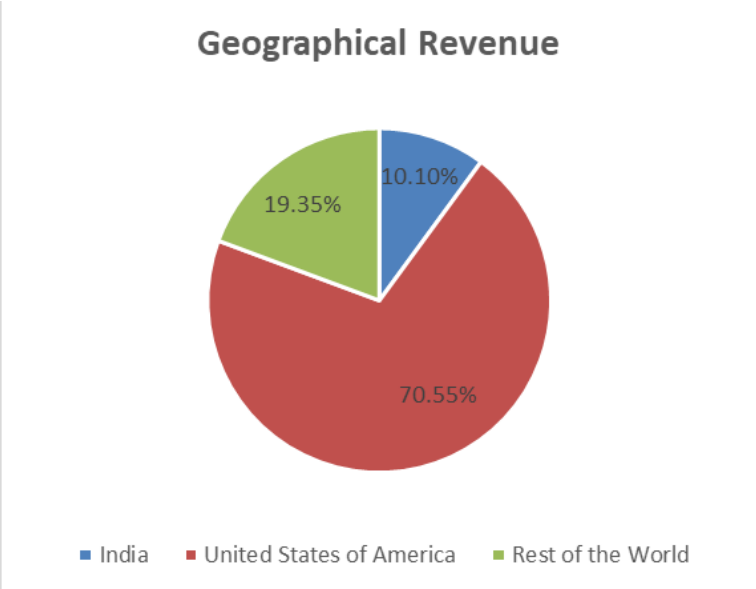


Company has increased its Operating Assets over the years with Dedicated R&D centres and Manufacturing facilities for both CRO & CMO businesses. Since last 5 years company is expending ~200 cr for Capex.

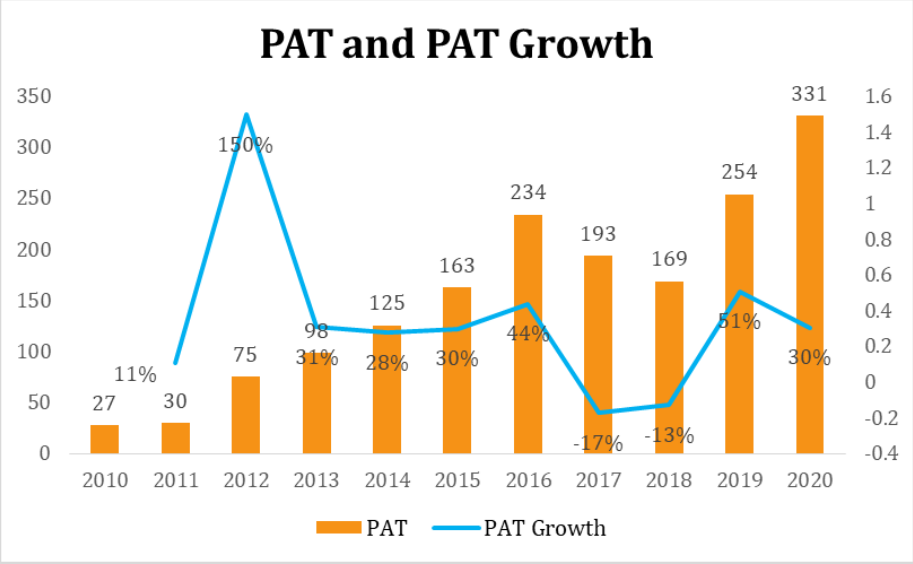


Company has reduced debt resulting in Debt to Equity ratio of 0.14 in FY'20 having Interest Coverage Ratio of 20 in FY'20.

Profit and Loss Statement (In cr)	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Net Sales	**264**	**322**	**417**	**550**	**700**	**860**	**1107**	**1201**	**1423**	**1826**	**2012**
Net Sales Growth		**22%**	**29%**	**32%**	**27%**	**23%**	**29%**	**8%**	**19%**	**28%**	**10%**
EXPENDITURE :											
Raw Materials Consumed	47	87	113	153	190	249	315	321	395	505	519
Power & Fuel Cost	16	19	20	21	23	28	31	30	35	41	46
Employee Cost	67	80	98	124	156	202	249	309	377	465	580
Repairs & Maintenance	76	6	6	8	16	21	30	56	67	86	104
General and Administration	15	9	13	18	42	55	65	84	143	147	152
EBIDTA	**84**	**109**	**143**	**169**	**213**	**281**	**380**	**384**	**390**	**534**	**611**
Depreciation	45	52	55	60	66	81	97	114	131	164	219
EBIT	**39**	**57**	**88**	**109**	**148**	**199**	**283**	**270**	**258**	**370**	**392**
Interest	8	27	10	7	0	8	8	18	23	32	35
Provision for Tax	4	0	3	4	22	29	40	59	67	84	90
PAT	**27**	**30**	**75**	**98**	**125**	**163**	**234**	**193**	**169**	**254**	**331**
PAT Growth		**11%**	**150%**	**31%**	**28%**	**30%**	**44%**	**-17%**	**-13%**	**51%**	**30%**

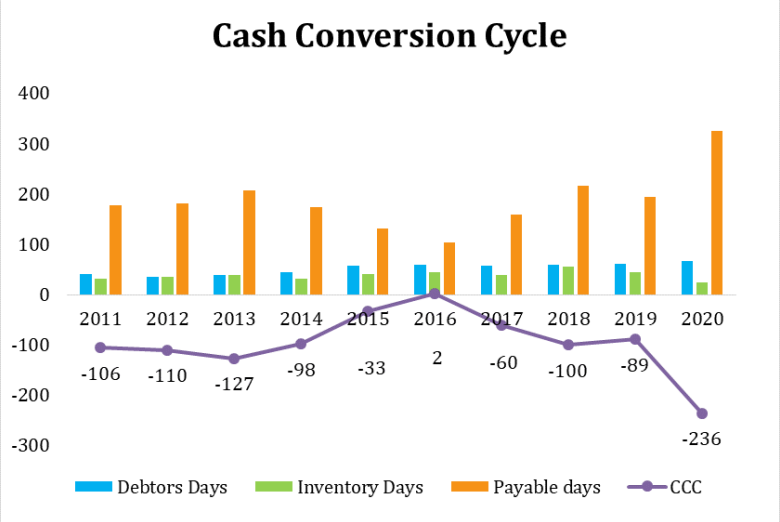


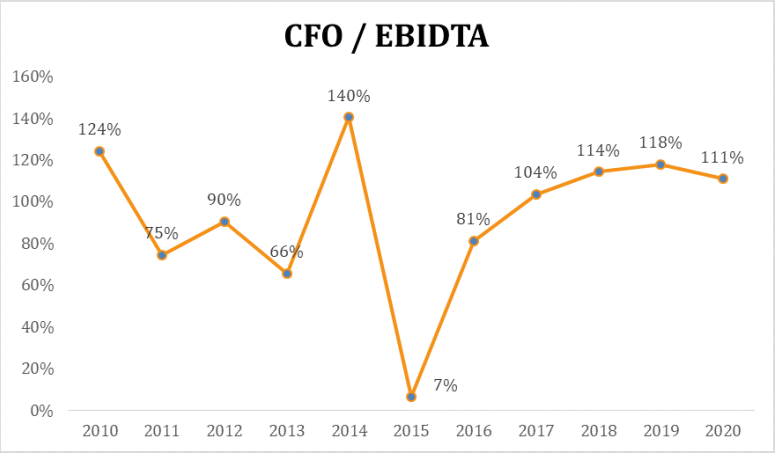
Company has generated ~70% Revenue from USA, ~10% from India and ~19% from ROW.



Company has increased its Sales as well as Profits over the years at a compounded annual growth rate of 19% and 15% respectively in last 5 years. Out of total expenditure, major costs are Employee costs(Scientists) & Raw Materials i.e 40% & 37% on an average basis.

Cash Flow Statement (In cr)	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Profit Before Tax	35	29	75	102	156	204	241	287	305	331	412
Adjustment	47	71	62	62	49	73	133	148	248	213	164
Depreciation	45	51	55	60	66	81	97	114	131	164	219
Interest Expeses	7	21	10	6	0	8	1	18	23	30	35
Changes In working Capital	30	-13	4	-34	130	-216	-26	37	-27	182	45
Trade & Other receivables	12	-6	-4	-33	-20	-78	-11	-19	-74	-70	-36
Inventories	-6	2	-10	2	3	-24	1	6	-54	43	18
Loans & Advances	-1	-13	-24	-24	-18	-134	-24	-1	-23	-13	-173
Trade & Other payables	25	-8	38	22	166	20	9	51	123	223	236
Cash From Operating Activities	**104**	**81**	**129**	**111**	**300**	**19**	**308**	**398**	**446**	**630**	677
CFO as % of Sales	40%	25%	31%	20%	43%	2%	28%	33%	31%	34%	34%
CFO as % of PAT	384%	269%	172%	113%	239%	11%	132%	206%	264%	248%	205%
Cash Flow from Investing Activiti	**-53**	**-20**	**-30**	**-157**	**-374**	**12**	**-751**	**-469**	**-350**	**-647**	**-428**
Purchase of Fixed Assets	-82	-30	-33	-68	-100	-204	-295	-306	-364	-583	-630
Cash from Financing Activites	**-45**	**-62**	**-70**	**21**	**155**	**-10**	**716**	**-81**	**-79**	**-72**	**-225**
Net Cash Inflow / Outflow	7	-1	30	-26	81	20	273	-152	17	-89	23
Closing Cash & Cash Equivalent	7	6	38	12	92	116	387	235	252	164	193





Company has increased Cashflow from Operations over the years which helps in funding Capex from internal sources and repayment of Debt. It has negative CCC which indicates that it earns heavy advances from customers (~15% of Revenue)which helps in maintaining Working Capital. Also it is able to hold Suppliers for a longer period of time.

It receives advances before rendering the services while the scientists are monthly. Hence this itself explains excellent operational efficiency.

Company has CFO/EBITDA of more than 100% since last 3 years.

Ratio	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
ROA	131%	165%	137%	123%	41%	32%	23%	16%	19%	22%
ROIC	188%	286%	255%		60%	37%	28%	19%	21%	25%
ROCE	15%	22%	23%	19%	19%	17%	10%	8%	11%	13%
WC/Sales	-1%	-10%	-5%	-25%	-10%	-10%	-15%	-10%	-10%	-9%
Cash ROA	188%	251%	145%	294%	5%	41%	45%	39%	43%	33%
Cash ROIC	270%	435%	270%		7%	47%	54%	45%	48%	36%
Cash ROCE	27%	21%	28%	17%	33%	1%	15%	17%	17%	23%
FCF	179.06	90.7	152.8	172	399.1	214.7	601.4	687	786.6	1183.2
FCF Growth		-49%	68%	13%	132%	-46%	180%	14%	14%	50%

- Company has ROIC of more than 25% whereas Cash ROIC of more than 35% annually, hence generating additional Alpha of more than 20%.
- It has ROA & ROCE of 22% & 13% respectively whereas cash ROA & cash ROCE of 33% & 23% respectively.
- Free Cashflow (FCF) has shown Compounded Annual Growth Rate of 24% & 23% since last 5 years & 10 years respectively.

Valuations

Expected Values	2021E	2022E	2023E	2024E	2025E	
Revenue	2515	3144	3930	4912	6140	
EBIT(1-T)	377	472	589	737	921	
FCFF	1258	1572	1965	2456	3070	82892
Cost of Capital	13%	13%	13%	13%	13%	
DCF	1113	1231	1362	1506	1666	47035
Total DCF	53913					
CMV	14656					
CAGR	30%					
PAT at 20%	503	629	786	982	1228	Return P.A
P/E at 15	7545	9431	11789	14736	18420	5%
P/E at 20	10060	12575	15719	19648	24561	11%
P/E at 25	12575	15719	19648	24561	30701	16%
Median P/E at 35	17605	22006	27508	34385	42981	24%
PAT at 15%	377	472	589	737	921	Return P.A
P/E at 15	5659	7073	8842	11052	13815	-1%
P/E at 20	7545	9431	11789	14736	18420	5%
P/E at 25	9431	11789	14736	18420	23026	9%
Median P/E at 35	13204	16505	20631	25789	32236	17%

Outlook

- The COVID-19 pandemic has introduced unprecedented challenges to the world economy. Also the demand shift from China has augured the growth in Indian Pharma Industry.
- In this context, it is expected that integrated CRAMs like Syngene can play an important role in supporting pharma and bio-pharma industries for innovative diagnostics, therapies and vaccines.

- As Syngene has recently become a fully Integrated player in terms of both, Horizontal as well as Vertical which would drive their growth in terms of both R&D as well as Commercial manufacturing space.

- Recently company expanded in commercial manufacturing of API and Biologics which would help in enhancing its scalability (Top line) because both API and Biologics are in demand due to disruptions in China.

- API segment being a capital intensive coupled with a recent drop of 10% in Chinese volumes opened up a new opportunities in India to cater this demand (It is expected Indian API market will get doubled in next 3-4 years).

- **Taking Syngene from here, it was able to generate a positive Net Cash position despite of paying Debt and Capex from its internal accruals and to add a flavour this position, its new manufacturing facilities are ready for commercialization which will start generating Revenues and is expected to grow hitting Cashflows.**

- Also the Parent is Biocon ltd which itself clarifies the Corporate Governance of the company.

- There are huge amount of Patent expiry in Biologics and other Pharma segments which can auger the growth in company in terms of both R&D as well as manufacturing.

- There are attractive opportunities within all their operating businesses of Discovery Services, Development Services, Manufacturing Services and Dedicated Centres as clients seek to keep pace with scientific innovation while increasing speed to market and operating efficiency and controlling their costs.