Deutsche Bank
Research

Rating
Buy

Europe
Belgium

Biotechnology
Biotechnology

Company
Galapagos

Reuters	Bloomberg	Exchange	Ticker
GLPG.AS	GLPGA NA	AMS	GLPG

ADR	ISIN
GLPYY	US36315X1019

Date
20 April 2021

Initiation of Coverage

Price at 16 Apr 2021 (EUR)	65.74
Price Target (EUR)	110.00
52-week range (EUR)	213.10 - 64.00

Worthwhile journeys of discovery carry risk: initiate with Buy

After the pipeline setbacks of 2020, former small-molecule discovery golden child GLPG appears firmly in the doghouse, trading below net cash, apparently on the premise it will burn its large cash pile to no avail, a prospect we consider extremely unlikely. Whilst a few hundred €m of GLPG's €5bn cash pile will be expended on the Jyseleca ex-US commercialisation effort 2022-24, guidance for €0.5bn peak with a 50% contribution margin post a 2024 profitability inflection look reasonable to us (particularly with IBD contributing ex-US). We also do not expect any let up in the additional annual ~€0.6bn cash burn, implying up to half of the total cash pile will be consumed before Jyseleca (potentially) turns profitable in 2024. But we do expect value will accrue from the broader R&D platform, with both the SIK and TYK2 programmes looking potentially major value drivers with significant proof of concept 2021 data catalysts. With GILD's 26% lockup extended to Aug'24 we see an obvious opportunity and initiate with Buy, NPV-based PT€110 (implying a present platform value of €2bn).

Thoughts on Jyseleca: likely an uphill battle in the EU

Despite the pricing aggression, we do not expect GLPG's solo Jyseleca commercialisation effort to have much impact in rheumatology in Europe and it will remain a niche option in gastro in the US, even if approval is finally granted: the mid'21 wk26 MANTA/RAY safety update is likely to be inconsequential given pathway to a US IBD filing is likely to require the 52wk data due early 2022 and even then we see little probability of the FDA accepting the 200mg dose. Moreover, we continue to regard the SELECTION UC data as underwhelming (relatively) and have limited expectations that upcoming Crohns DIVERSITY P3 due H1'22 will look markedly better, rendering the eventual FDA verdict somewhat moot, though given market size we believe IBD could comfortably add a few €'00m to the ex-US opportunity (EU UC approval due H1).

Thoughts on the pipeline proposition

We do not think the GLPG platform has a problem: OA and IPF are extremely challenging indications so recent discontinuations for '1972/'1690 are not wholly surprising, whilst Jyseleca is a legitimate asset somewhat undone by an unfortunate safety signal. On the SIKs, P2 RA LADYBUG/UC SEATURTLE updates due for '3970 mid'21 look key (P1 CALOSOMA Ps data looks of lesser consequence) and whilst the absence of any clinical data to date makes the read out relatively binary, the preclinical data has been promising the biologic rationale is supportive

Valuation & Risks

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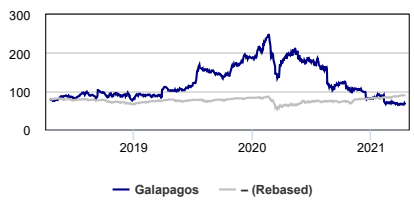
Price/price relative



Performance (%)	1m	3m	12m
Absolute	-4.4	-20.2	-65.1
DJ (.STOXXE)	4.2	10.1	44.9

Source: Deutsche Bank

Key indicators (FY1)

ROE (%)	-13.4
ROA (%)	-5.9
Net debt/equity (%)	-78.9
Book value/share (EUR)	32.6
Price/book (x)	2.0
Net interest cover (x)	–
EBIT margin (%)	-14.9

Source: Deutsche Bank

Stock option liquidity data

Shares outstanding (m)	65
Option volume (und. shrs., 1M avg.)	–
Market cap (EUR)(m)	4,319.6
Free float (%)	–

Source: Deutsche Bank

(albeit long-term oncogenic safety will remain a key question). Beyond the SIK assets, TYK2 asset '3667 first P1b data due later in 2021 looks a key pivot: despite being late behind BMY/PFE – the opportunity is large, depending on BMY's detailed safety data at AAD (and FDA labelling…). GPR84 antagonist GLPG1205's Nov'20 P2 proof of concept was modestly encouraging and we await P2b data in due course with interest, whilst the CFTR assrt '2737 for ADPKD and '555 JAK1 in OA look more speculative, in our view.

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Key Catalysts

Figure 1: Key catalyst events for Galapagos

Product	Event/Comments	Date
Filgotinib	MANTA/Rat week 26 results	H1 2021
Filgotinib	UC submission Japan	H1 2021
Filgotinib	CHMP opinion UC	H1 2021
Filgotinib	UC approval decision EMA	H2 2021
Filgotinib	DIVERSITY topline data (CD)	H1 2022
Filgotinib	UC approval decision Japan	H1 2022
Filgotinib	Potential submission for CD (EMA)	H2 2022
Filgotinib	Potential submission for CD (Japan)	H2 2022
GLPG3970 (Toledo)	P1b CALSOMA in Psoriasis readout	Q2 2021
GLPG3970 (Toledo)	P2 SEATURTLE in UC readout	Q2/Q3 2021
GLPG3970 (Toledo)	P2 LADYBUG in mod/severe RA readout	Q2 2021
GLPG3970 (Toledo)	P1 TAPINOMA in SLE readout	Q2 2022
GLPG3667 (TYK2)	P1b PsoA readout	Q2 2021
GLPG4399 (SIK3)	P1 in healthy volunteers readout	Q3 2021
GLPG2737	P2 MANGROVE in cystic fibrosis (read out)	Q4 2022

Source : Deutsche Bank Research

Key Current Assets

*We provide below **brief summaries of key marketed products** and include key information around mechanism of action, additional indications filed and ongoing trials, terms and conditions in case of collaboration/licensing agreements and company guidance/outlook by drawing into competitive dynamics for each product.*

Figure 2: Marketed, filed and in-development indications for Jyseleca

Approved Indications	Approved Markets	Extension Indications	Market Filings	Pivotal Trials	Primary completion	NCT ID
Moderate/severe RA	EMA (Sep'20)/ Japan (Sep'20)	-	US filing cancelled (Feb'21)	P3 FINCH1/2/3 (completed)	Completed	NCT02889796/ NCT02873936/ NCT02886728
-	-	Ulcerative colitis (UC)	EU filing submitted (Nov'20)	P3 SELECTION1 (positive) P3 MANTA/Ray (safety data pending)	SELECTION1 (completed) MANTA/Ray (52-week safety data in H2 2021)	NCT03926195
-	-	Crohn's Disease (CD)	-	P3 DIVERSITY (ongoing)	Nov-22	NCT02914561

Source : Deutsche Bank Research

Current filings, approvals and launch activities*:* Jyseleca (filgotinib) is currently approved in the EU and Japan for moderate-severe rheumatoid arthritis (approved in September 2020), with first markets of launch including UK (NICE recommendation received, unprecendentedly in early RA - we believe largely due to pricing) and Germany. In August 2020, Gilead/Galapagos received a complete response letter (CRL) from the FDA based on which Gilead decided not to launch Jyseleca in the US for the RA indication. In ulcerative colitis (UC), an EU filing was made in November 2020 and a filing in Japan is expected this year, whilst a US filing will depend on further safety data (see below). The ongoing P3 DIVERSITY trial in

Crohn's Disease has a primary completion of November 2021. We also note that filgotinib patents in both the US and ex-US are valid until 12/31/2030.

Further detail on UC program*:* A filing with the FDA in UC was dependent upon a positive readout of the safety trials P3 MANTA/MANTA-RAy assessing the impact of filgotinib on semen parameters, a key safety consideration for the FDA. On 4th March 2021, results from these studies were press released, showing no signs of further decline in sperm concentration at week 13 (8.3% patients on placebo vs. 6.7% patients on filgotinib had a 50% or more decline in sperm concentration). A full 52-week follow up is required for the safety assessment to be completed and the company to be in a position to file this data with the FDA, thus estimating a potential filing by end of 2021/early 2022. The FDA has specifically requested up to week 52 follow-up data for patients who show >50% decrease in semen parameters by week 26 and do not recover in the ongoing MANTA/RAy studies.

Figure 3: Key ulcerative colitis (UC) data (*part 1)*

Drug	Recommended dose	Trial	Date/year Reported	NCT	n	Inclusion /exclusion criteria	Permitted concomitant medications	Baseline severity				Clinical response assessment tool	Clinical remission assessment tool	Induction (PBO adjusted)			Maintenance (PBO adjusted)		
								Concomitant corticosteroid use at baseline (%)	Duration of disease (median)	Total Mayo Score	% with extensive colitis/pancolitis	Previous anti-TNF failure/exposure			Clinical Response	Clinical Remission	Endoscopic mucosal healing	Clinical Response	Clinical Remission	Endoscopic mucosal healing
Xeljanz (tofacitinib)	oral 5mg/10mg BID	OCTAVE Induction 1	2017	NCT01465763	598	**Inclusion:** -Documented diagnosis at least 4months prior to study entry -Subjects must have failed or be intolerant of at least corticosteroids (oral/IV), thioprines, anti-TNF **Exclusion:** -disease limited to distal 15cm i.e. proctitis	-5-ASAs -oral glucocorticoids (max:25mg QD) -Tapering of glucocorticoids was mandatory in maintenance trial	10mg: 45% PBO: 47.5%	10mg: 6.5 yrs PBO: 6.0 yrs	10mg: 9.0 PBO: 9.1	10mg: 53.1% PBO: 54.1%	Failure: 10mg: 51.1% PBO: 52.5% Exposure: 10mg: 53.4% PBO: 53.3%	≥3 point or ≥ 30% decrease from BL in Mayo score	Total Mayo score of 2 points or lower	**Wk-8** PBO-adj: 27.1% 10mg: 59.9% PBO: 32.8%	**Wk-8** PBO-adj: 10.3% 10mg: 18.5% PBO: 8.2%	**Wk-8** PBO-adj: 15.7% 10mg: 31.3% PBO: 15.6%		-	-
		OCTAVE 2 induction	2017	NCT01458951	541	**Inclusion:** -Documented diagnosis at least 4months prior to study entry -Subjects must have failed or be intolerant of at least corticosteroids (oral/IV), thioprines, anti-TNF **Exclusion:** -disease limited to distal 15cm i.e. proctitis	-5-ASAs -oral glucocorticoids (max:25mg QD) -Tapering of glucocorticoids was mandatory in maintenance trial	10mg: 46.2% PBO: 49.1%	10mg: 6.0 yrs PBO: 6.2yrs	10mg: 9.0 PBO: 8.9	10mg: 49.3% PBO: 50.5%	Failure: 10mg: 51.7% PBO: 53.6% Exposure: 10mg: 54.5% PBO: 58.0%	≥3 point or ≥ 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower	**Wk-8** PBO-adj: 26.4% 10mg: 55% PBO: 28.6%	**Wk8** PBO-adj: 13% 10mg: 16.6% PBO: 3.6%	**Wk-8** PBO-adj: 16.8% 10mg: 11.6% PBO: 28.4%		-	-
		OCTAVE sustain	2017	NCT01458574	593	Enrolled subjects from OCTAVE 1 and OCTAVE 2	-5-ASAs -oral glucocorticoids (max:25mg QD) -Tapering of glucocorticoids was mandatory in maintenance trial	5mg: 51.0% 10mg: 44.2% PBO: 50.2%	5mg: 6.5yrs 10mg: 6.8yrs PBO: 7.2yrs	5mg: 3.3 10mg: 3.4 PBO: 3.3	5mg: 52.0% 10mg: 52.6% PBO: 54.5%	Failure: 5mg: 41.9% 10mg: 47.2% PBO: 44.9% Exposure: 5mg: 45.5% 10mg:51.3% PBO: 46.5%	N/A	Total Mayo score of 2 points or lower					**Wk-52** PBO-adj 5mg: 23.2% PBO-adj 10mg: 29.5% 5mg: 34.3% 10mg: 40.6% PBO: 11.1%	**Wk-52** PBO-adj 5mg: 24.3% PBO-adj 10mg: 32.6% 5mg: 37.4% 10mg: 45.7% PBO: 13.1%
Humira (Adalimumab)	Induction: 160mg Wk0, 80mg Wk 2 (SC) Maintenance: 40mg eoWk (SC)	ULTRA-1	2011	NCT00385736	390	**Inclusion:** -Documented diagnosis at least 3months prior to study entry -Stable oral CS and/or thiopurine use prior to screening -Judged to be in good health by PI **Exclusion:** -disease limited to distal 15cm i.e. proctitis -recipients of prior anti-TNF -IV corticosteroids 14 days prior to screening	-5-ASAs -oral glucocorticoids -thioprines	PBO: 41.5% ADA 80/40: 36.9% ADA160/80: 36.9%	PBO: 5.35yrs ADA 80/40: 6.91yrs ADA160/80: 6.06yrs	PBO: 8.70 ADA 80/40: 9.0 ADA160/80 : 8.8	PBO: 56.2% ADA 80/40: 53.8% ADA160/80: 46.2%	0%	N/A	Total Mayo score of 2 points or lower	**Wk8** PBO-adj-ADA 80/40: 6.9% PBO-adj-ADA160/80: 10.0%	**Wk8** PBO-adj: 9.3% ADA160/80: 18.5% PBO-adj: 0.8% AD80/40: 10% PBO: 9.2%: 9.2%				
		ULTRA-2	2013	NCT00408629	518	**Inclusion:** -Documented diagnosis at least 3months prior to study entry -Stable oral CS and/or thiopurine use prior to screening -Judged to be in good health by PI **Exclusion:** -disease limited to distal 15cm i.e. proctitis -recipients of Humira -IV corticosteroids 14 days prior to screening	5-ASAs oral corticosteroids thiporines	59%	8.3yrs	8.9	49%	Exposure: 40%	≥3 point or ≥ 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower	**Wk8** PBO adj: 15.8% ADA 160/80: 50.4% PBO: 34.6%	**Wk8** PBO adj: 7.2% ADA 160/80: 16.5% PBO: 9.3%		**Wk52** PBO adj: 8.8% ADA 160/80: 17.3% PBO: 8.5%	**Wk52** PBO adj: 7.2% ADA 160/80: 16.5% PBO: 9.3%	

Source : Deutsche Bank Research

Figure 4: Key ulcerative colitis (UC) data (*part 2)*

Drug	Recommended dose	Trial	Date/year Reported	NCT	n	Inclusion /exclusion criteria	Permitted concomitant medications	Baseline severity				Clinical response assessment tool	Clinical remission assessment tool	Induction (PBO adjusted)			Maintenance (PBO adjusted)		
								Concomitant corticosteroid use at baseline (%)	Duration of disease (median)	Total Mayo Score	% with extensive colitis/pancolitis	Previous anti-TNF failure/exposure			Clinical Response	Clinical Remission	Endoscopic mucosal healing	Clinical Response	Clinical Remission	Endoscopic mucosal healing
Remicade (Infliximab)	Induction: 5mg/kg, 0,2,6 wks (iv) Maintenance : 5mg Q8W (iv)	ACT-1	2005	NCT-00036439	364	**Inclusion:** -Documented diagnosis at least 3months prior to study entry **Exclusion:** -Rectal corticosteroids or 5-ASA 14 days prior to screening -Recipients of anti-TNF	-5-ASAs -oral glucocorticoids -thioprines	5mg: 57.9% 10mg: 59.8% PBO: 65.3%	5mg: 5.9yrs 10mg: 8.4yrs PBO: 6.2yrs	5mg: 8.5 10mg: 8.4 PBO: 8.4	5mg: 47.1% 10mg: 44.6% PBO: 45.0%	0%	≥3 point or ≥ 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower	**Wk8** PBO-adj-5mg: 32.2% PBO-adj-10mg: 24.3% 5mg: 69.4% 10mg: 61.5% PBO: 37.2%	**Wk8** PBO-adj-5mg: 23.9% PBO-adj-10mg: 17.1% 5mg: 38.8% 10mg: 32% PBO: 14.9%	**Wk8** PBO-adj-5mg: 28.1% PBO-adj-10mg: 25.1% 5mg: 62% 10mg: 59% PBO: 33.9%	**Wk30** PBO-adj-5mg: 32.3% PBO-adj-10mg: 31% 5mg: 52.1% 10mg: 50.8% PBO: 29.8% **Wk54** PBO-adj-5mg: 25.7% PBO-adj-10mg: 24.5% 5mg: 45.5% 10mg: 44.3%	**Wk30** PBO-adj-5mg: 18.2% PBO-adj-10mg: 21.2% 5mg: 33.9% 10mg: 36.9% PBO: 15.7% **Wk54** PBO-adj-5mg: 18.2% PBO-adj-10mg: 17.9% 5mg: 34.7% 10mg: 34.4%	**Wk30** PBO-adj-5mg: 25.6% PBO-adj-10mg: 24.4% 5mg: 50.4% 10mg: 49.2% PBO: 24.8% **Wk54** PBO-adj-5mg: 27.3% PBO-adj-10mg: 28.5% 5mg: 45.5% 10mg: 46.7%
		ACT-2	2005	NCT-00096655	364	**Inclusion:** -Documented diagnosis at least 3months prior to study entry **Exclusion:** -Rectal corticosteroids or 5-ASA 14 days prior to screening -Recipients of anti-TNF	-5-ASAs -oral glucocorticoids -thioprines	5mg: 49.6% 10mg: 55.0% PBO: 48.8%	5mg: 6.7yrs 10mg: 6.5yrs PBO: 6.5yrs	5mg: 8.3 10mg: 8.3 PBO: 8.5	5mg: 40.7% 10mg: 37.5% PBO: 41.7%	0%	>3 point or > 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower	**Wk8** PBO-adj-5mg: 35.2% PBO-adj-10mg: 39.9% 5mg: 64.5% 10mg: 69.2% PBO: 29.3%	**Wk8** PBO-adj-5mg: 28.2% PBO-adj-10mg: 21.8% 5mg: 33.9% 10mg: 27.5% PBO: 5.7%	**Wk8** PBO-adj-5mg: 29.4% PBO-adj-10mg: 30.8% 5mg: 60.3% 10mg: 61.7% PBO: 30.9%	**Wk30** PBO-adj-5mg: 21.1% PBO-adj-10mg: 34% 5mg: 47.1% 10mg: 60% PBO: 26%	**Wk30** PBO-adj-5mg: 15% PBO-adj-10mg: 25.2% 5mg: 25.6% 10mg: 35.8% PBO: 10.6%	**Wk30** PBO-adj-5mg: 16.2% PBO-adj-10mg: 26.6% 5mg: 46.3% 10mg: 56.7% PBO: 30.1%
Entyvio (vedolizumab)	Induction: 300mg at Wk0, 2, and 6 (iv) Maintenance : 300mg Q8W	GEMINI I	2013	NCT00783718	895	**Inclusion:** -Documented failure/intolerance of at least 5yrs to: IMM, anti-TNF, corticosteroids **Exclusion:** -Chronic hep B or C -abdonimal abscess -Have received non-permitted IBD therapies within 60 days	-Glucocorticoids -thioprines	300mg: 36.7% PBO: 38.9%	300mg: 6.8yrs PBO: 7.1yrs	300mg: 8.6 PBO: 8.6	300mg: 37.7% PBO: 33.6%	Exposure 300mg: 48% PBO: 49% Failure: 300mg: 41% PBO: 42%	≥3 point or ≥ 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower	**Wk6** PBO-adj: 21.7% Vedo: 47.1% PBO: 25.5%	**Wk6** PBO-adj: 11.5% Vedo: 16.9% PBO: 5.4%	**Wk6** PBO-adj: 16.1% Vedo: 40.9% PBO: 24.8%	**Wk52** PBO-adj-Q8W: 32.8% PBO-adj-Q4W: 28.2% Q8W: 56.6% Q4W: 52% PBO: 23.8%	**Wk52** PBO-adj-Q8W: 26.1% PBO-adj-Q4W: 29.1% Q8W: 41.8% Q4W: 44.8% PBO:15.9%	**Wk52** PBO-adj-Q8W: 32% PBO-adj-Q4W: 36.3% Q8W: 51.6% Q4W: 56% PBO: 19.8%
		VARSITY	2019	NCT-02497469	771	**Inclusion:** -Documented diagnosis at least 3months prior to study entry -≥15cm colon involvement -Previous anti-TNF failure or TNF-naive but failing 5-ASA/IMM/corticosteroids **Exclusion:** -Chronic Hep B or C -Abdominal abscess	-Glucocorticoids -thioprines	Vedolizumab:36.1% Adalimumab: 36.3%	Vedolizumab: 7.3yrs Adalimumab: 6.4yrs	Vedolizumab: 8.7 Adalimumab: 8.7	Vedolizumab :36.1% Adalimumab: 36.3%	Failure: Vedolizumab: 18.7% Adalimumab: 20.5%	>3 point or > 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower			s		**Wk52 vs. HUMIRA Overall** PBO-adj: 8.8% Vedo:31.3% Ada:22.5% **TNF-naïve** PBO-adj: 9.9% Vedolizumab: 34.2% PBO:24.3%	**Wk52 vs. HUMIRA Overall** PBO-adj: 11.9% Vedo:39.7% Ada:27.7% **TNF-naïve** PBO-adj: 13.6% Vedolizumab: 43.1% PBO:29.5%

Source : Deutsche Bank Research

Figure 5: Key ulcerative colitis (UC) data (*part 3)*

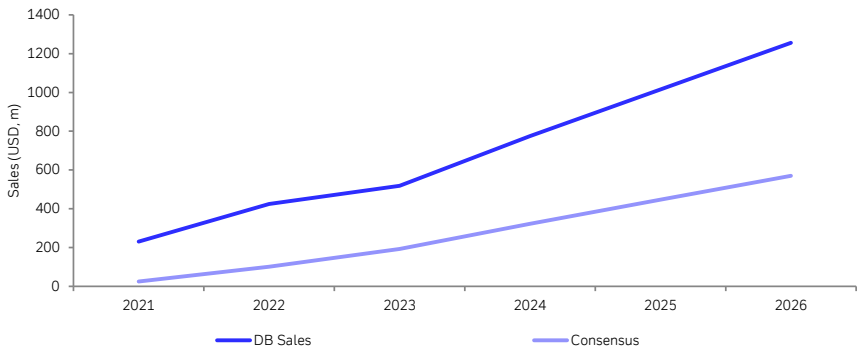
Drug	Recommended dose	Trial	Date/year Reported	NCT	n	Inclusion /exclusion criteria	Permitted concomitant medications	Baseline severity				Clinical response assessment tool	Clinical remission assessment tool	Induction (PBO adjusted)			Maintenance (PBO adjusted)		
								Concomitant corticosteroid use at baseline (%)	Duration of disease (median)	Total Mayo Score	% with extensive colitis/panc olitis	Previous anti-TNF failure/exposure			Clinical Response	Clinical Remission	Endoscopic mucosal healing	Clinical Response	Clinical Remission	Endoscopic mucosal healing
Stelara (ustekinumab)	Induction: 6mg/kg once iv Maintenance : 90mg sc Q8W	UNIFI	2019	NCT02407236	961	**Inclusion:** -Documented diagnosis at least 3months prior to study entry -≥15cm colon involvement -Previous anti-TNF failure or TNF-naive but failing 5-ASA/IMM/corticosteroids -washing out of vedolizumab of at least 4months and anti-TNF of at least 8 wks **Exclusion:** -severe extensive colitis -disease <20cm of colon	-5-ASAs -glucocorticoids -thioprines	130mg: 54.1% 6mg/kg: 52.2% PBO: 49.2%	130mg: 8.1yrs 6mg/kg: 8.2yrs PBO:8.0yrs	130mg: 8.9 6mg/kg: 8.9 PBO:8.9	130mg: 8.9 6mg/kg: 8.9 PBO:8.9	anti-TNF Failure: 130mg: 33.4% 6mg/kg: 32.9% PBO: 35.1% Biologic failure: 130mg: 51.2% 6mg/kg: 51.6% PBO: 50.5%	≥3 point or ≥ 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower	**Wk8** **Biologic failure** PBO-adj-6mg/kg: 29.9% 130mg: 45.1% 6mg/kg: 57.2% PBO IV: 27.3% **Biologic naïve** PBO-adj 6m/kg: 30.9% 6mg/kg: 66.7% 130mg: 57.9% PBO IV: 35.8%	**Wk8** **Biologic failure** PBO-adj-6mg/kg: 11.5% 130mg: 11.6% 6mg/kg: 12.7% PBO IV: 1.2% **Biologic naïve** PBO-adj 6m/kg: 8.5% 6mg/kg: 18.4% 130mg: 20.7% PBO IV: 9.9%	**Wk8** **Biologic failure** PBO-adj-6mg/kg: 14.3% 130mg: 18.3% 6mg/kg: 21.1% PBO IV: 6.8% **Biologic naïve** PBO-adj 6m/kg: 12.1% 6mg/kg: 33.3% 130mg: 35.3% PBO IV: 21.2%	**Wk44** **Biologic failure** PBO-adj-Q8W: 26.2% 90mg Q8W: 64.8% 90mg Q12W: 55.7% PBO SC: 38.6% **Biologic naïve** PBO-adj-Q8W: 24.8% 90mg Q8W: 77.2% 90mg Q12W: 76.8% PBO SC: 52.4%	**Wk44** **Biologic failure** PBO-adj-Q8W: 22.6% 90mg Q8W: 39.6% 90mg Q12W: 22.9% PBO: 17% **Biologic naïve** PBO-adj-Q8W: 18.5% 90mg Q8W: 50.6% 90mg Q12W: 47.4% PBO: 32.1%	**Wk44** **Biologic failure** PBO-adj-Q8W: 22.4% 90mg Q8W: 45.1% 90mg Q12W: 25.7% PBO: 22.7% **Biologic naïve** PBO-adj-Q8W: 22.5% 90mg Q8W: 58.2% 90mg Q12W: 54.7% PBO: 35.7%
Filgotinib	100mg or 200m	SELECTION1	2020	NCT02914522	1351	**Inclusion:** -Inadequate response, loss of response or intolerance to at least 1 of CS, IMM, anti-TNF or vedolizumab **Exclusion:** -Active TB -Use of any concomitant prohibited medications -Ulcerative proctitis				biologic-naive: 52% had score of ≥9 biologic-experienced: 74% had score of ≥9		biologically-experienced: 51% biologically-naive: 49%	≥3 point or ≥ 30% decrease from BL in total Mayo score	Total Mayo score of 2 points or lower		**Wk10** **Biologic-naïve** PBO-adj: 10.8% 200mg: 26.1% PBO: 15.3% **Biologic-experienced** PBO-adj:7.3% 200mg: 11.5% PBO: 4.2%			**Wk58** **Biologic-naive & experienced** **200mg:** PBO-adj: 26% 200mg: 37.2% PBO: 11.2% **100mg group:** PBO-adj:10.3% 100mg: 23.8% PBO: 13.5%	
RINVOQ (upadacitinib)	45 mg, once daily	U-ACHIEVE	2020	NCT02819635	473	**Inclusion:** - Inadequate response to, loss of response or intolerance to AS, CS, immunosuppressants, biologics **Exclusion:** - CD/IC patients, prior JAKi									**Wk 8** PBO-adj: 46% 45mg: 73% PBO: 27%	**Wk 8** PBO-adj: 19% 45mg: 26% PBO: 5%	**Wk 8** PBO-adj: 29% 45mg: 36% PBO: 7%			

Source : Deutsche Bank Research

Commercial performance of filgotinib

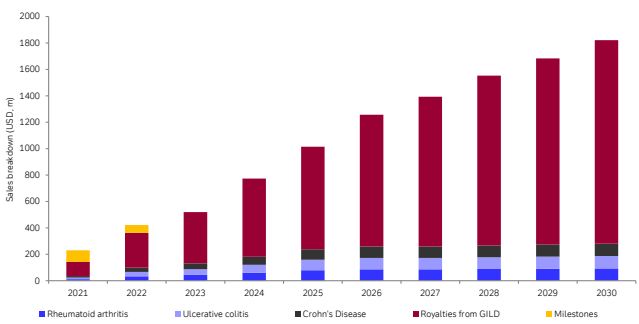
Commercial summary: Jyseleca sales are expected to reach ca. $230m in 2021 and have the potential to reach $1.2bn by 2026. Royalties from GILD constitute the majority of revenues for filgotinib, whilst we note milestone payments of ca. $90m and $60m are expected (estimated) in the years 2021 and 2022, respectively. The charts below illustrate our Jyseleca sales vs consensus as well as detailed breakdown of sales by indication, royalties and milestone payments.

Figure 6: Filgotinib sales (DB forecast vs consensus)



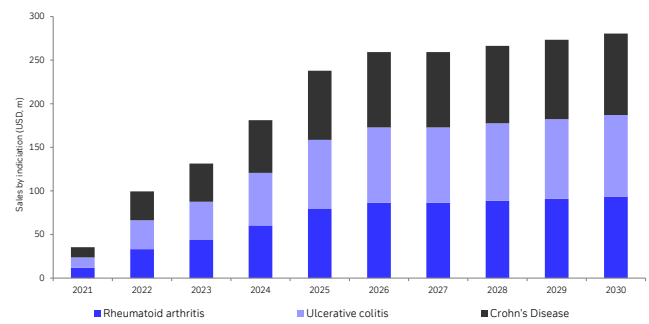
Source : Deutsche Bank Research, Evaluate Pharma

Figure 7: Filgotinib sales forecast (breakdown by indication, royalties, milestone payments)



Source : Deutsche Bank Research

Figure 8: Filgotinib sales forecast (breakdown by indication only)



Source : Deutsche Bank Research

Key Pipeline Assets

*Below, we provide **brief summaries of key pipeline products** and include key information around mechanism of action, additional trials ongoing, terms and conditions in case of collaboration/licensing agreements and draw into competitive dynamics, where that information is available.*

Pipeline summary: Galapagos is currently working across multiple therapeutic areas including inflammation, fibrosis, kidney diseases and others including metabolic diseases. In inflammation, Galapagos has recently showcased its Toledo program (October 2020), dedicated to developing novel therapeutics in inflammation and fibrosis.

Figure 9: Company clinical development portfolio

Drug/Molecule	MoA	Phase	Indication(s)	Clinical Trials	PCD
GLPG3970 (Toledo)	SIK2/3	2	Psoriasis, SLE, RA, UC, Sjogren's	1b (CALOSOMA, NCT04106297) 2 (SEA TURTLE, NCT04577794) 2 (LADYBUG, NCT04577781) 1 (TAPINOMA, NCT04700267) 2 (GLIDER, NCT04700280)	2021-2022
GLPG1205	GPR84	2	IPF	2 - PINTA (NCT03725852) (Positive)	Jul-20
GLPG4716	Chitinase	2	IPF	P2 (in planning)	
GLPG2737	CFTR	2	ADPKD Cystic fibrosis*	2 - MANGROVE (NCT04578548) 2 - PELICAN (NCT03474042)*	Nov-22
GLPG3667	TYK2	1	PsoA	1b (NCT04594928)	May-21
GLPG4399 (Toledo)	SIK3	1	Undisclosed	N/A	N/A
GLPG0555	JAK1	1	OA	N/A	2021
GLPG4586	Undisclosed	Pre-clinical	IPF	N/A	N/A
GLPG4605 (Toledo)	SIK2/3	Pre-clinical	Undisclosed	N/A	N/A
GLPG4059	undisclosed	Pre-clinical	Metabolic diseases	N/A	N/A

Source : Deutsche Bank Research
**Rights of GLPG2737 for cystic fibrosis have been sold to AbbVie*

GLPG3970 (SIK2/3 inhibitor, part of the "Toledo" program)

Mechanism: GLPG3970 is an inhibitor of salt-inducible kinases (SIK2/SIK3) leveraging a dual mode of action on the immune system by stimulating anti-inflammatory cytokines and inhibiting pro-inflammatory cytokines, currently in P2 trials.

Key trials and catalysts: POC P2 trials in psoriasis/RA/UC were initiated in 2020 and readouts are expected in 2021

Toledo program: The Toledo program is part of GLPG's strategic effort to develop inhibitors of salt-inducible kinases (SIKs) believed to be master switches of the immune system. It is of high strategic importance to the company with ¼ of the company's human resource dedicated to this program. The program currently consists of 3 compounds beyond drug discovery stage, including the P2 asset GLPG3970, P1 asset GLPG4399 and preclinical asset GLPG4605. This program aims to concurrently advance multiple candidates with different selectively profiles and across a number of indications, with a focus on inflammation. Gilead maintains the option to in-license the ex-European commercial rights to each of the Toledo candidates post-P2 trial under their original collaboration terms (see later in this note). The company held a roundtable in October 2020 showcasing the Toledo program as its new platform for brining new assets to the market through a 3-step process (target identification, confirmation of dual mode of action, broad launching platform).

- **Key Toledo CMD takes:** the company highlighted that the Toledo program focuses on identifying assets that restore the immune balance (immunoregulatory and pro-inflammatory effect) as compared to current therapies that focus on immune suppression only. There is also a focus on broad cellular activity on both innate and adaptive immune cells. At the center of this approach lie salt-inducible kinases (SIKs) 1,2,3, which are said to be targeted by GLPG3970 (SIK2/3), GLPG4605 (SIK2/3) and GLPG4399 (SIK3). Using in vivo models across indications, GLPG aims to demonstrate the dual activity (pro-inflammatory and immune regulatory) of its assets. During the Toledo Roundtable, in vivo IBD, fibrosis, psoriasis and arthritis model data for GLPG3970 were presented, showing its dual mode of action on the immune system. Clinical evaluation in healthy volunteers is done in multiple single ascending dose (SAD) and multiple ascending dose (MAD) cohorts, whilst assessing PK/PD and ex vivo dual activity, before proceeding with concurrent trials across multiple indications

Below is a **summary of ongoing clinical trials for Toledo assets**, GLPG3970 and GLPG4399. As of late February 2021, there are no available clinical data for any of these trials; however, at least 3 GLPG3970 trials may be reading out in 2021. We note that GLPG3970 is the program's lead asset and its lead indications are UC and RA, currently in P2 studies with primary completion in June and October 2021, respectively. We also note there is a plan in psoriatic arthritis, with the potential to enter P3 studies in 2023.

Figure 10: Ongoing clinical trials for Toledo assets

Compound	Mechanism	Phase	Indication	Size	Initiation	Primary Completion	Outcomes
GLPG3970	SIK2/3	1b (CALOSOMA, NCT04106297)	Moderate/severe psoriasis (baseline PASI≥12, BSA≥10%)	25	Sep-19	Mar-21	Safety, tolerability
		2 (SEA TURTLE, NCT04577794)	Moderate/severe UC (treatment experienced)	30	Oct-20	Jun-21	Mayo clinical score, safety, tolerability, PK/PD efficacy markets
		2 (LADYBUG, NCT04577781)	Moderate/severe RA and inadequate response to MTX	25	Oct-20	Apr-21	Signs and symptoms of RA, safety, tolerability, PK/PD efficacy markers
		1 (TAPINOMA, NCT04700267)	Systemic Lupus Erythematosus	30	Dec-20	Mar-22	Efficacy biomarkers, safety, tolerability, PK/PD
		2 (GLIDER, NCT04700280)	Primary Sjogren's Syndrome	30	Jan-21	May-22	Efficacy, safety
GLPG4399	SIK3	1	Healthy	112	Nov-20	Jul-21	Safety, PK/PD

Source : Deutsche Bank Research

Further detail from Toledo Roundtable: The company has hinted at the potential to leverage combinations of SIK-inhibitors with other in-house assets for development in indications such as idiopathic pulmonary fibrosis (IPF).

GLPG1205 (GRP84)

Mechanism: GLPG1205 is a GPR84 inhibitor discovered by GLPG and has shown improvements in signs and symptoms in IPF animal models as well as favorable tolerability in healthy volunteers and in ulcerative colitis patients in previous trials.

Key trials and catalysts: Positive results from the P2a PINTA trial were reported in November 2020. At week 26, in a total of 68 IPF patients, there was an improvement in forced vital capacity (FVC) for the group receiving 100mg of GLPG1205 (-76mL on placebo; -34mL on treatment). A P2b trial is in planning. On its Q4 2020 investor call, the company suggested a potential combination with pirfenidone or nintedanib could be possible.

Figure 11: Key IPF candidates in P2 and P3 development

Project	Company	Mechanism	Trial details
Phase III			
Ziritaxestat (GLPG1690)	Galapagos/ Gilead	Autotaxin inhibitor	Isabela1 (NCT03711162), Isabela2 (NCT03733444), both end Dec 2021
Pamrevlumab	Fibrogen	Anti-CTGF antibody	Zephyrus (NCT03955146) ends Dec 2022; Zephyrus II (NCT04419558) ends Apr 2023
RG6354 (PRM-151/pentraxin-2)	Roche	MREG differentiation stimulant	NCT04552899, ends Feb 2023
Phase II			
GLPG1205	Galapagos	GPR84 antagonist	Pinta (NCT03725852) reported, ph2b dose-finding study planned
Belumosudil (KD025)	Kadmon	ROCK2 inhibitor	NCT02688647 completed Jul 2020
MN-001	Medicinova	Leukotriene, PDE 3 & 4 & 5-LO inhibitor	NCT02503657, ends Dec 2020
Ifenprodil (NP-120)	Algernon	NMDA2B antagonist	NCT04318704, ends Mar 2021
CC-90001	Bristol Myers Squibb	JNK1 inhibitor	NCT03142191, ends Jun 2021
ND-L02-s0201 (BMS-986263)*	Nitto Denko	HSP47 RNAi therapeutic	Juniper (NCT03538301), ends Jul 2021
Jaktinib	Suzhou Zelgen Biopharmaceuticals	Jak 1-3 inhibitor	NCT04312594, ends Oct 2021
TD139	Galecto Biotech	Galectin-3 inhibitor	Galactic-1 (NCT03832946), ends Dec 2021
PLN-74809	Pliant Therapeutics	TGF beta 1 inhibitor	NCT04396756, ends Dec 2021
VP01 (C21)	Vicore Pharma	AT2 agonist	NCT04533022, ends Mar 2022
Ianalumab (VAY736)	Novartis	Anti-BAFF antibody	NCT03287414, ends Aug 2022
Setanaxib (GKT831)	Genkyotex	NOX1 & 4 inhibitor	NCT03865927, ends Jul 2023
BMS-986278	Bristol Myers Squibb	LPA1 antagonist	NCT04308681, ends Nov 2023
BLD-2660	Blade Therapeutics	Calpain inhibitor	NCT04244825, suspended due to Covid-19

Source : Deutsche Bank Research, Evaluate Pharma

GLPG4716 (Chitinase)

Mechanism: GLPG4716 (formerly OATD-01, inlicensed from OncoArendi) is a small molecule CHIT1/AMCase inhibitor targeting a key pathway in tissue remodeling. It has shown promising translational data, a favorable profile in animal studies at expected therapeutic doses and has successfully completed P1 studies in healthy volunteers.

OATD-01 deal terms with Gilead: Following acquisition from OncoArendi, Gilead has an option to opt-in post-P2b with a milestone payment of €150 million at the end of P2b, resulting in a 50-50 split of R&D expenses. Gilead would be responsible for commercialisation ex-Europe, with tiered royalty in the range of 20%-24% due to Galapagos.

Key trials and catalysts: The company is planning a P2 trial in IPF and potentially other diseases with a fibrotic component.

GLPG0555 (JAK1)

Mechanism and other details: GLPG0555 and GLPG0778 are both JAK1 inhibitors discovered and developed within GSK's immuno-inflammatory collaboration with GLPG. GSK retains the rights to the compounds and Galapagos is eligible to receive milestone payments and double-digit royalties on global sales. Following an assessment of the risk-benefit profile of GPLG0778 by GSK, all indications were terminated. Development of GLPG0555 has continued.

Key trials and catalysts: Completion of GLPG0555 P1b in osteoarthritis (initiated this year) is expected in 2021, according to the company as stated on its Q4 2020 investor call. However, we note there are no details listed on clinicaltrials.gov

GLPG3667 (TYK2)

Mechanism: As a Tyrosine Kinase-2-targeting (TYK2) drug, GLPG3667 targets a receptor of the JAK family, implicated in IFN-a, IL-6, IL-10 and IL-12 signaling.

Key trials and catalysts: P1b in psoriasis was initiated in November 2020, with

results possibly available in 2021 (PCD: May 2021; NCT04594928). The endpoints in this study include frequency and severity of TEAEs, Psoriasis Area and Severity Index (PASI) change and plasma trough concentrations.

Summary of competitive landscape in TYK2: The current TYK2 landscape consists of multiple players including BMS, Pfizer, JNJ as well as smaller players such as Theravance, Sareum, Innocare and Nimbus Therapeutics. We note the collaboration of JNJ with Theravance and BMS with Nimbus. As the most advanced TYK2 asset in this space, BMS-986165/deucravacitinib is a selective TYK2 inhibitor with positive P3 data in psoriasis and positive P2 data in psoriatic arthritis (further detail below), whilst additional data in psoriasis is expected in Q1'21 from the P3 POETYK PSO-2 trial with additional data expected at AAD in April (23-25 April). We note that BMY's TYK2 data will serve as the benchmark for efficacy; we summarise key details so far below.

Figure 12: Key TYK2 inhibitors in development

Company	Product	Mechanism of Action	Phase	Key Indications
Bristol-Myers Squibb	BMS-986165 (deucravacitinib)	TYK2	3	Psoriasis, Psoriatic arthritis, Lupus nephritis, Systemic Lupus Erythematosus, Crohn's, Ulcerative colitis
Pfizer	PF-06826647	TYK2	2	Plaque psoriasis, Hidradenitis suppurativa, Ulcerative colitis
Pfizer	PF-06700841 (brepocitinib)	TYK2 / JAK1	2	Plaque psoriasis, Ulcerative colitis, Crohn's, Vitiligo, Atopic dermatitis, Psoriasis, Alopecia areata, Lupus, Hiddradenitis suppurativa
Johnson & Johnson	TD-1473	TYK2 / JAK1,2,3	3	Ulcerative colitis
Oncostellae	OST-122	ARK5 / JAK1,2,3 / TYK2	2	Ulcerative colitis
Theravance Biopharma	TD-8236	TYK2 / JAK1,2,3	2	Inflammatory lung diseases (asthma)
Theravance Biopharma	TD-0903	TYK2 / JAK1,2,3	2	COVID-19 Acute Lung Injusry
Pfizer	PF-06700841 (brepocitinib)Topical	TYK2 / JAK1	2	Atopic dermatitis, Plaque psoriasis
Bristol-Myers Squibb/Nimbus	Tyk2 Allosteric Inhibitor Research Program	TYK2	1	N/A
Galapagos	GLPG3667	TYK2	1b	Psoriatic arthritis
Sareum	SDC-1802	TYK2 / JAK1	Pre-clinical	N/A
Sareum	SAR-20347	TYK2 / JAK1	Pre-clinical	N/A
InnoCare	ICP-332	TYK2	Pre-clinical	N/A
Nimbus Therapeutics	Tyk2 Catalytic Inhibitor Research Program	TYK2	Pre-clinical	N/A

Source : Deutsche Bank Research

Details so far for BMY's deucravacitinib

- **P2 data in psoriatic arthritis**: In September 2020, BMS announced positive P2 data in psoriatic arthritis, in which both 6mg (n=70) and 12mg (n=67) deucravacitinib once daily showed at least a 20% improvement vs placebo in signs and symptoms of disease at Week 16. There were also improvements from baseline in the Health Assessment Questionnaire-Disability Index (HAQ-DI) and in the Physical Component Summary (PCS) Score of the Short Form Health Survey-36 Item (SF-36) Questionnaire. There were no serious AEs in deucravacitinib patients, with most common AEs including nasopharyngitis (17.9% vs 7.6% in placebo), rash (6.0% vs 0% in placebo) and headache (1.5% vs 4.5% in placebo).
- **P3 data in psoriasis: Both of BMY's P3 pivotal trials have read out positive.** Positive data from POETYK PSO-1 were announced in March 2020, whilst topline results from POETYK-PSO-2, evaluating deucravacitinib in moderate-severe plaque psoriasis were announced in February 2021. POETYK PSO-2 trial (plaque psoriasis) met the same primary and secondary endpoints and demonstrated a safety profile in line with POETYK PSO-1, with full data expected to be presented at a future meeting (AAD 23-25 April 2021; a BMY analyst meeting is scheduled on 23rd April).

Details so far for PFE's topical TYK2/JAK1 brepocitinib/PF-06700841

- **P2 data in moderate-severe atopic dermatitis**: Presented at EADV October 2020, topical brepocitinib demonstrated a reduction in eczema area and severity index (EASI) total score and improvement in investigator's global assessment (IGA). In terms of safety, 37% of patients had TEAEs with more reported in the vehicle arm vs brepocitinib arms. The majority of TEAEs were mild and did not increase with dose in the brepocitinib arms.

GLPG2737 (CTFR corrector)

Summary of GLPG2737 and AbbVie collaboration: GLPG2737 is a novel cystic fibrosis transmembrane conductance regulator in development for ADPKD (P2 MANGROVE; primary completion November 2022) and in cystic fibrosis (P2 PELICAN; completed April 2018). In 2013, a collaboration deal was agreed between AbbVie and Galapagos to co-develop cystic fibrosis therapies, with AbbVie paying an upfront of $45m and Galapagos eligible for up to $360m in further milestone-dependent payments. In 2016, the deal expanded by increasing milestone payments to $600m, as part of the companies' effort to expand their collaboration and cystic fibrosis portfolio, adding GLPG2222/2665/1837. The amendment was also a result of a shift of focus from double to triple drug combinations. This was further followed by a second restructuring of the agreement in 2018, whereby AbbVie acquired the rights of all cystic fibrosis assets (except GLPG1837 and GLPG2737) for an upfront $45m and a reduction of milestone payments that GLPG would be eligible for, by up to $200m. This was due to underwhelming P2 PELICAN trial data, which triggered a review of the partnership and resulted in AbbVie taking greater ownership over the development of the CF portfolio. GLPG will be eligible to receive tiered royalty percentages ranging from single digit to low teens on net sales of licensed products in the event AbbVie receives regulatory approval and realizes commercial sales in CF (see collaboration summary in Figure 13).

P2 MANGROVE trial: In December 2020, GLPG announced that the first patient in MANGROVE phase 2 trial was dosed. MANGROVE is enrolling up to 60 patients (across 7 European countries) with autosomal dominant polycystic kidney disease (ADPKD) with rapidly progressing disease, with treatment to be administered for 52 weeks. Primary endpoints include the growth of total kidney volume of 52 weeks compared to placebo as well as overall safety and tolerability. Secondary endpoints include renal function, PK and PD outcomes.

Figure 13: GLPG's collaboration with AbbVie in Cystic Fibrosis has evolved since the initial agreement

Date of deal or amendment	Description/Rationale	Upfront payment	Milestone payments	Deal terms/responsibilities	Relevant assets
September 2013 (Initial Deal)	Joining of resources and expertise in CF	$45m	GLPG eligible for up to $360m (development, regulatory, sales)	Shared responsibility and costs for P3	All CF assets
May 2016 (Amendment)	Expanded collaboration following advancement of assets; Shifted focus from double to triple drug combinations	-	GLPG eligible for a further $250m tied to P1/2 milestones	Galapagos responsibe for P1/2 trial execution	All CF assets
October 2018 (Amendment)	Review of the partnersip following underwhelming clinical readouts. AbbVie to pursue CF programs alone	$45m	Reduction of milestones by up to $200m	AbbVie obtained exclusive worldwide rights, including costs and responsibility for future activities	All CF assets except for GLPG1837 and GLPG2737

Source : Deutsche Bank Research

In regards to GLPG2737, GLPG have retained exclusive global commercial rights with AbbVie eligible to receive up to $20 million upon achievement of a late stage development milestone, and tiered single digit royalties on future global

commercial sales, if approved, in indications outside CF. Similarly, GLPG retains global commercial rights for GLPG1837 (potentiator candidate), with AbbVie eligible for a low-single-digit royalty on future global commercial sales.

As of the date of its latest report (Q4 2020), GLPG disclosed that the company have achieved $112.5m as milestones under the agreement, in addition to the $90m total upfront payments from the initial and amended agreement and are still eligible for up to $175m as a result of future development, regulatory and sales-based milestones.

GLPG4586

Summary: GLPG4586 is a drug targeting fibroblast activation instead of other biological processes involved in fibrosis biology (e.g. epithelium injury or immune response/macrophages targeted by GLPG1205/4716 or extracellular matrix accumulation). This asset is currently in preclinical studies and is the first preclinical candidate to emerge from the collaboration with fibrotic disease-focused Fibrocor Therapeutics.

Other financial/strategic considerations

Recently announced/planned corporate structure changes & business development

Disposals: In January 2021, a strategic transaction was announced in which Selvita acquired Fidelta, a contract research organization with core scientific competencies in inflammation, fibrosis and anti-infectives, from Galapagos. Selivta acquired 100% of the outstanding shares in Fidelta for an enterprise value of €31.2m, following an initial

In-licensing and M&A activity: The company disclosed that there are plans for continued in-licensing and M&A activity in 2021, potentially with deals on par or larger than the OncoArendi (€25m) deal, with the aim of filling the pipeline gap, as a result of the recent discontinuations.

Summary of collaboration with Gilead: A 10-year collaboration between Gilead and Galapagos was formed in July 2019 with a $3.95bn upfront payment to Galapagos and a $1.1bn equity investment. This has provided Gilead exclusive product license and option rights to develop and commercialize all current and future programs in countries outside Europe. The deal terms also included a $150m opt-in fee per program beyond filgotinib, plus tiered royalties on net sales ranging from 20-24% for all products licensed by Gilead.

Following the announcement that the companies will not be pursuing an RA filing in the US for filgotinib, the collaboration was amended in December 2020, with respect to filgotinib, including a change in cost sharing with Galapagos bearing full development costs for certain studies (DARWIN3, FINCH4, FILOSOPHY and P4 studies or registries in RA, MANTA, MANTA-RAy, PENGUIN1/2, EQUATOR2, SEALION1/2, HUMBOLDT), whilst the 50-50 development cost split will remains in place for SELECTION, DIVERSITY, DIVERGENCE1/2 and Crohn's disease/IBD trials. Additionally, as of January 1st , 2022, Galapagos will own the full commercial economics in Europe and will be subject to payment of tiered royalties (8-15%) of net sales to Gilead, starting from 2024 (until then, profits will continue to be split equally in line with the previous agreement). A €160m payment will be made to Galapagos (€110m in 2021, €50m in 2022).

Figure 14: Collaboration details between GILD and GLPG

Date of deal or amendment	Timelines	Upfront payment	Equity payment	Deal terms	Relevant assets
July 2019 (Initial Deal)	2019-2029 (10yr partnership)	$3.95bn	$1.1bn	Exclusive product license & option rights for all products ex-EU	All
December 2020 (Amendment)	2021+	€0.16bn ($0.19bn)	-	50-50 P&L share for EU commercialization (until 2021YE); GLPG full commercial economics from 2022 Royalty 8%-15% to GILD for all GLPG economics in EU (from 2024) No further EU milestones to GLPG	Filgotinib

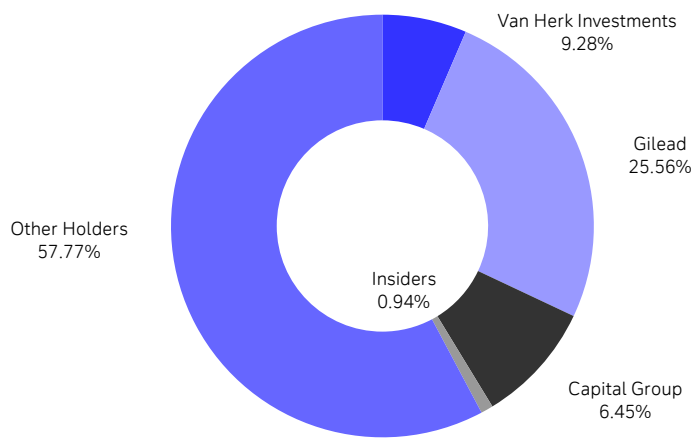
Source : Deutsche Bank Research

Key stakes (family/other shareholdings) using pie chart from IR site of BBG/HDS function

The shareholding structure of GLPG shares is shown below on an undiluted basis; **free-float, defined as the percentage of shares not subject to a lock-up arrangement (i.e. Gilead holdings), is 74%**.

An extension of lock-up period was announced on 8th April 2021 as an amendment to the initial share subscription agreement closed in 2019. The extension is now valid for 5 years as compared to the previous lock-up of 2 years, followed by a 3-year period during which the company would have held a minimum of 20% of outstanding shares.

Figure 15: Shareholding structure



Source : Deutsche Bank Research, Company Website

MT guidance (table with any comments)

Figure 16: MT Guidance Table

Deutsche Bank
MT guidance table

Estimates	FY21 Guidance (FX-adj.) at Q1'21	FX guidance FY21 at Q1'21	20 actual	DB 2021E	Co cons 2021E	DB yoy 2020-21 chg	Cons yoy 2020 21 chg	2021 Cons vs DB	Mid-term guidance
Filgotinib									
Jyseleca									We anticipate that we can make this a EUR 0.5 billion product in second half of this decade. We also anticipate that by then, this can be a contribution margin of approximately 50%. And we've also highlighted that we think that this is going to be breakeven in 2024, so after 3 years of investments.
									Jyseleca expected to be profitable in the EU from 2024.
Third Party Revenues									
Other Income									
Total Revenue									
SG&A									
R&D									
Other									
Core EBIT									
Core EBIT margin									
Core EPS									

Source : Deutsche Bank company data

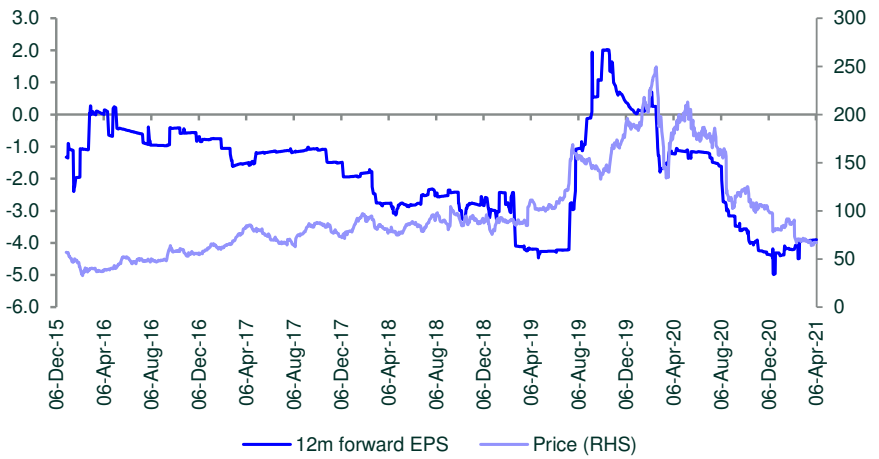
DB vs consensus

Figure 17: DB forecast vs consensus estimates

	1Q21E	2021E	2022E	2023E	2024E
Total sales CONS	**121**	**538**	**554**	**635**	**700**
Total sales DB	**144**	**693**	**709**	**722**	**793**
VAR	**19%**	**29%**	**28%**	**14%**	**13%**
diluted EPS CONS	-0.96	-3.94	-3.50	-3.35	-2.92
diluted EPS DB	-1.3	-4.9	-3.8	-3.2	-1.3
VAR	**30%**	**25%**	**8%**	**-4%**	**-57%**

Source : Deutsche Bank, Bloomberg Finance LP

Figure 18: EPS consensus estimate revisions



Source : Bloomberg Finance LP

Detailed forecasts

Figure 19: Income Statement

DB									
GLPG NA (EURmm, Dec)	**17**	**18**	**19**	**20**	**21E**	**22E**	**23E**	**24E**	**25E**
INCOME STATEMENT									
Revenue	156	318	886	530	693	709	722	793	807
Growth (% yoy)	3%	104%	179%	-40%	31%	2%	2%	10%	2%
COGS	0	0	0	0	-5	-11	-19	-29	-41
Gross Profit	156	318	886	530	688	699	703	764	767
Growth (% yoy)	3%	104%	179%	-40%	30%	1%	1%	9%	0%
Gross margin (%)	100%	100%	100%	100%	99%	99%	97%	96%	95%
SG&A	-27	-40	-97	-185	-229	-263	-302	-333	-339
Growth (% yoy)	16%	46%	144%	91%	23%	15%	15%	10%	2%
% of sales	17%	13%	11%	35%	33%	37%	42%	42%	42%
R&D	-219	-323	-420	-524	-602	-662	-696	-709	-724
Growth (% yoy)	57%	48%	30%	25%	15%	10%	5%	2%	2%
% of sales	140%	102%	47%	99%	87%	93%	96%	89%	90%
IFRS EBIT	-90	-45	369	-179	-103	-119	-153	-79	-37
Growth (% yoy)	682%	-50%	-923%	-148%	-42%	16%	28%	-48%	-53%
Other (income)/deductions--net	-26	16	-220	-131	-219	-161	-105	-59	0
Growth (% yoy)	-139%	-161%	-1512%	0%	0%	0%	0%	0%	0%
Income before provision for taxes	-116	-29	149	-310	-322	-262	-225	-89	33
Income Tax Expense	0	0	0	-1	0	13	11	4	-2
Net profit from discontinued operations, net of tax	0%	0%	116%	557%	0%	0%	0%	0%	0%
Minority Interest	0%	0%	0%	0%	0%	0%	0%	0%	0%
Reported Net Profit	-116	-29	150	-305	-322	-249	-214	-84	31
Shares outstanding -- diluted	49	52	60	65	65	66	67	67	68
Growth (% yoy)	5%	6%	15%	8%	0%	1%	1%	1%	1%
Reported EPS (diluted)	-2	-1	2	-5	-5	-4	-3	-1	0
Growth (% yoy)	-305%	-76%	-545%	-288%	5%	-23%	-15%	-61%	-137%
Shares outstanding -- basic	49	52	65	65	66	66	67	68	68
Growth (% yoy)	0%	0%	0%	0%	0%	0%	0%	0%	0%
Regular D&A	4	7	12	19	23	24	24	27	27
% of sales	3%	2%	1%	4%	3%	3%	3%	3%	3%
EBITDA	-86	-38	381	-160	-80	-96	-129	-53	-10
Growth (% yoy)	1070%	-56%	-1103%	-142%	-50%	20%	35%	-59%	-81%
% of sales	-55%	-12%	43%	-30%	-12%	-13%	-18%	-7%	-1%
Dividend per diluted share	0	0	0	0	0	0	0	0	0
DPS growth rate	0	0	0	0	0	0	0	0	0

Source : Deutsche Bank estimate; company data

Figure 20: Cash Flow

DB									
GLPG NA (EURmm, Dec)	**17**	**18**	**19**	**20**	**21E**	**22E**	**23E**	**24E**	**25E**
CASH FLOW STATEMENT									
Operating Activities									
Net income / loss	-116	-29	150	-305	-322	-249	-214	-84	31
Tax Expense	0	0	0	2	0	0	0	0	0
Other net financial expenses	26	-9	-8	2	0	0	0	0	0
FV re-measurement of subscription share agreement	0	0	182	-3	0	0	0	0	0
Depreciation	4	4	12	19	23	24	24	27	27
Amortization and Inventories write-off	1	3	0	0	0	0	0	0	0
Net realized loss on FX	0	0	0	0	0	0	0	0	0
Share based comp.	17	19	38	80	0	0	0	0	0
Decrease in provisions	0	0	0	0	0	0	0	0	0
Increase in pension liabilities	0	0	0	0	0	0	0	0	0
Discounting effect of deferred income									
Unrealized exchange gains/losses	0	0	11	105	0	0	0	0	0
Fair value adjustment	0	0	-2	14	0	0	0	0	0
Gain on sale of business/fixed assets	0	0	0	0	0	0	0	0	0
Adjustment for items under investing/financing CF	0	0	-5	-2	0	0	0	0	0
Interest paid	0	-1	-1	-9	0	0	0	0	0
Interest received	1	5	8	10	0	0	0	0	0
Taxes paid	0	0	0	-1	0	0	0	0	0
	0	0	0	0	0	0	0	0	0
Net cash from operations	-147	-142	3209	-427	-405	-450	-412	-279	-173
From Investing Activity	0	0	0	0	0	0	0	0	0
Acquisitions	0	0	0	0	0	0	0	0	0
Disposals	0	0	0	0	0	0	0	0	0
Purchases of PP&E	-5	-10	-22	-43	-37	-38	-38	-42	-43
Disposals of PP&E	0	0	0	0	0	0	0	0	0
R&D and other intangibles	-2	-3	-23	-49	0	0	0	0	0
Decrease in restricted cash	7	0	0	0	0	0	0	0	0
Proceeds from sale of AFS financial assets	0	-2	-3724	845	0	0	0	0	0
Others	0	0	5	4	0	0	0	0	0
Net Cash from Investing	-1	-16	-3765	757	-37	-38	-38	-42	-43
From Financing Activity									
Net change in financial liabilities	353	296	956	28	0	0	0	0	0
Proceeds from capital increases	0	0	-5	-6	0	0	0	0	0
Repayment of obligations under leases	0	0	0	0	0	0	0	0	0
Dividend (paid)/ received	0	-8	385	0	0	0	0	0	0
Other	353	288	1336	22	0	0	0	0	0
Net Cash from Financing	353	288	1336	22	0	0	0	0	0
Exchange	-28	10	-10	-71	0	0	0	0	0
Cash/Equiv Balance (BOY)	973	1151	1291	1862	2135	1693	1206	756	435
Net Cash Flow	178	140	571	274	-442	-487	-450	-321	-216
Cash/Equiv Balance (EOY)	1151	1291	1862	2135	1693	1206	756	435	219
Free Cash Flow	-152	-153	3186	-470	-442	-487	-450	-321	-216
Growth (% yoy)	-2	0	-22	-1	0	0	0	0	0
Per share	-3	-3	53	-7	-7	-7	-7	-5	-3
% of NI	1	5	21	2	1	2	2	4	-7

Source : Deutsche Bank estimate; company data

Figure 21: Balance Sheet

DB									
GLPG NA (EURmm, Dec)	**17**	**18**	**19**	**20**	**21E**	**22E**	**23E**	**24E**	**25E**
BALANCE SHEET									
Assets									
Cash and Cash Equivalents	1151	1,291	1,862	2,135	1,693	1,206	756	435	219
Current financial investments	0	0	3,919	3,026	3,026	3,026	3,026	3,026	3,026
Inventories	0	0	0	0	5	10	18	27	37
Accounts Receivable	28	19	54	148	87	93	101	110	115
R&D incentive recievables	12	11	22	24	24	24	24	24	24
Restricted Cash	0	0	0	0	0	0	0	0	0
Other current assets	6	8	9	35	35	35	35	35	35
Total Current Assets	1198	1,329	5,866	5,369	4,871	4,395	3,961	3,657	3,456
Intangible Assets	2	4	25	68	68	68	68	68	68
Property, Plant & Equipment, net	17	23	66	103	140	178	216	258	301
Deferred Tax Assets	2	3	4	4	4	4	4	4	4
Non-current R&D incentive recievables	64	73	93	112	112	112	112	112	112
Non-current restricted cash	1	0	0	50	50	50	50	50	50
Other non-current assets	2	8	14	11	11	11	11	11	11
Total Assets	1286	1,440	6,069	5,718	5,256	4,817	4,422	4,160	4,002
Liabilities									
Provisions	0	0	0	0	0	0	0	0	0
Finance Lease Liabilities	0	0	6	6	6	6	6	6	6
Accounts Payable	47	69	143	172	238	253	277	301	314
Current Tax Payable	1	1	2	1	1	1	1	1	1
Accrued Charges	1	0	1	0	0	0	0	0	0
Deferred Income	123	150	414	443	443	443	443	443	443
Current Financial liabilities	0	0	6	3	3	3	3	3	3
Other current	0	0	0	9	9	9	9	9	9
Current liablities									
Pension Liabilities	4	4	8	15	15	15	15	15	15
Provisions	0	0	0	0	0	0	0	0	0
Finance Lease Liabilities	0	0	20	23	23	23	23	23	23
Other non-current liabilities	2	2	7	8	8	8	8	8	8
Non-current deferred income	97	0	2,586	2,366	2,366	2,366	2,366	2,366	2,366
Non-current financial liabiltiies	0	0	0	0	0	0	0	0	0
Total Liabilities									
Equity capital	233	237	287	291	291	291	291	291	291
Share Premium	993	1,278	2,704	2,728	2,728	2,728	2,728	2,728	2,728
Other reserves	-1	-1	-5	-11	-575	-992	-1,448	-1,697	-1,905
Treasury Stock	0	0	0	0	0	0	0	0	0
Translation differnces	-2	-2	-1	-3	-3	-3	-3	-3	-3
Accumulated losses	-211	-298	-109	-335	-297	-335	-297	-335	-297
Total Shareholders' Equity									
Total Liabilities and Shareholders' Equity	1286	1,439	6,069	5,718	5,256	4,817	4,422	4,160	4,002

Source : Deutsche Bank estimate; company data

Figure 22: Product Overview

Deutsche Bank														
GLPG NA (EURmm, Dec)	**17**	**18**	**19**	**20**	**21E**	**22E**	**23E**	**24E**	**25E**	**26E**	**27E**	**28E**	**29E**	**30E**
Revenues														
filgotinib - RA sales growth	0	0	0	0	0	1	1	1	0	0	0	0	0	0
filgotinib - RA sales	0	0	0	0	41	82	144	215	301	377	414	435	444	448
filgotinib - UC sales growth	0	0	0	0	0	0	1	1	1	0	0	0	0	0
filgotinib - UC sales	0	0	0	0	0	22	44	66	99	132	165	181	190	194
filgotinib - Crohns sales growth	0	0	0	0	0	0	0	1	1	0	0	0	0	0
filgotinib - Crohns sales	0	0	0	0	0	0	16	32	48	64	80	88	94	99
Jyseleca total global sales	0	0	0	0	41	104	204	313	448	572	659	704	728	741
of which US	0	0	0	0	0	15	42	69	103	137	171	188	199	205
of which EU	0	0	0	0	33	70	127	192	270	340	380	402	412	417
of which RoW	0	0	0	0	8	19	35	53	75	95	107	114	117	119
filgotinib - GILD royalty rate														
filgotinib - royalties from GILD	0	0	0	0	1	2	5	8	12	16	21	23	24	25
filgotinib - milestones	0	0	0	0	75	50	0	0	0	0	0	0	0	0
Total Jyseleca to GLPG														
GLPG 1690 US	0	0	0	0	0	0	0	0	0	0	0	0	0	0
GLPG 1690 ex US	0	0	0	0	0	0	0	0	0	0	0	0	0	0
GLPG 1690 - milestones	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total GLPG 1690														
CF triple - royalties from ABBV	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total CF														
GLPG 1972 - US sales / int'l royalty	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total GLPG 1972														
MOR 106 - royalty	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total MOR 106														
Gilead - 1690 upfront	0	0	667	0	0	0	0	0	0	0	0	0	0	0
Gilead - filgo deferred revenues	0	0	-92	228	228	228	228	228	228	228	228	228	228	228
Gilead - platform	0	0	81	230	230	230	230	230	230	230	230	230	230	230
Novartis payment	0	48	0	0	0	0	0	0	0	0	0	0	0	0
Third Party Revenues														
Total Revenue														

Source : Deutsche Bank estimate; company data

Detailed valuation

Figure 23: NPV Summary

	Risk Weight	PV/ share EUR	PV bn EUR
			-
In-line disclosed assets		**-**	**-**
filgotinib - RA	100%	22.56	1.47
filgotinib - CD	50%	2.07	0.13
filgotinib - UC	90%	7.76	0.51
GLPG 1690	0%	-	-
GLPG 1972	0%	-	-
Pipeline		**32.38**	**2.11**
Other & R&D terminal		**73.33**	**4.77**
Total portfolio		**105.71**	**6.88**
Restructuring (net)		-	-
R&D (net)		(71.42)	(4.65)
Capex		(3.42)	(0.22)
EV (Healthcare)		**30.86**	**2.01**
Associates & Investments			
Net cash position		79.23	5.16
Pensions		-	-
Minorities		-	-
Debt and other		**79.23**	**5.16**
Group MV		**110.09**	**7.17**

Source : Deutsche Bank estimates

Price target

We set an NPV-based PT of EUR110, implying a present platform value of EUR2bn in addition to the EUR5bn net cash position. We believe an NPV-based methodology is most appropriate as we take note of the profitability of the company combined with the R&D story. Whilst we believe it is too early to attribute platform value specifically between the TYK2, SIK and early stage programmes, we believe the former two alone could comfortably account for much of this amount even with a high risk adjustment at this stage of development and we expect to gain greater clarity on specific programme potential with the updates due later this year.

Risks

Downside risks: worse commercial performance outcomes from marketed assets may stem from a potentially worse-than-expected continued launch for Jyseleca in RA and delays or negative outcomes in terms of the regulatory decisions in UC/CD. Worse outcomes within the pipeline portfolio of GLPG may come from development delays or negative data from its IPF program and Toledo group of assets across indications.

Summary valuation and share price performance

Figure 24: European Pharmaceuticals valuation comps

Stock	Cty	FX	Rating	Current price	Target price	Upside/ downside (%) to PT	PT implied 2021 P/E (x)	NPV/ sh	NPV Up/ down-side	NPV implied '21 P/E	Mcap (US$bn)	Cons Core P/E		DB Adj. P/E		prem/ disc to '21 P/E	DB IFRS PE	EV/EBITDA		EV/Sales		EV/FCF		Dividend yield		FCF yld	DB EPS CAGR		Cons EPS CAGR	DB Sales CAGR		Cons Sales CAGR	3yr PEG FWD	Net Debt / EBITDA		1mo perf (EUR)		1y perf (EUR)	
												2021E	2022E	2021E	2022E		2021	2021E	2022E	2021E	2022E	2021E	2022E	2021E	2022E	2021E	20-'23E	20-'25E	20E-23E	20-'23E	20-'25E	20E-23E		2022E	2023E	1m abs	1m abs in EUR	1yr abs	1yr abs in EUR
EU major Pharma							**18.2**			**20.4**	**1,087**	**15.8**	**13.9**	**16.4**	**14.5**		**20.3**	**11.1**	**10.0**	**4.0**	**3.7**	**8.4**	**16.2**	**3.6%**	**3.9%**	**4.6%**	**9%**	**14%**	**8%**	**6%**	**8%**	**5%**	**0.8**	**1.3**	**1.2**				
AstraZeneca	UK	US$	Buy	7,380	10,200	38%	26.9	9,715	32%	25.6	146	20.4	15.9	19.4	13.9	15%	15.3	10.2	7.1	3.5	2.8	18.4	15.5	3.1%	3.7%	4.7%	28%	37%	24%	19%	24%	15%	0.8	1.1	1.6	4%	4%	-9%	-7%
GlaxoSmithKline	UK	GBP	Sell	1,346	1,150	-15%	12.1	2,039	51%	21.5	94	13.4	12.0	14.2	13.5	-16%	19.0	10.3	9.8	2.8	2.7	17.7	15.2	5.9%	5.9%	7.9%	-2%	4%	2%	2%	5%	3%	-7.7	2.3	2.3	3%	3%	-20%	-19%
Novartis	SWI	US$	Buy	81	100	24%	17.6	102	27%	18.0	199	14.0	12.9	14.2	13.1	-16%	26.9	11.1	10.4	4.0	3.8	16.8	15.3	3.6%	3.8%	5.9%	8%	13%	8%	3%	5%	4%	1.9	1.6	1.2	1%	2%	-8%	-12%
Novo Nordisk	DEN	DKK	Buy	449	500	11%	25.7	528	18%	27.1	167	23.3	20.9	23.1	20.8	36%	23.1	16.5	15.0	7.5	6.9	24.8	22.4	2.2%	2.4%	3.9%	9%	16%	10%	7%	12%	7%	2.8	0.0	-0.1	2%	2%	2%	2%
Roche	SWI	CHF	Hold	309	325	5%	16.7	344	11%	17.6	290	15.9	15.0	15.8	14.7	-6%	20.5	11.0	10.4	4.6	4.4	15.8	14.8	3.0%	3.1%	6.6%	6%	11%	5%	4%	6%	3%	2.8	0.3	-0.1	1%	1%	-7%	-11%
Sanofi	FRA	EUR	Sell	85	70	-18%	11.3	100	18%	16.2	128	13.9	12.4	13.8	12.5	-19%	16.5	10.2	9.5	3.2	3.1	17.6	16.0	4.0%	4.4%	6.6%	7%	12%	8%	2%	4%	4%	2.2	0.8	0.5	3%	3%	-2%	-2%
SXDP (STOXX Healthcare)														**19.2**	**17.1**									**2.5%**	**2.6%**										**4%**	**4%**	**0%**	**0%**
SXXP (STOXX 600)														**18.4**	**16.1**									**2.9%**	**3.1%**										**4%**	**4%**	**32%**	**32%**
EU smid-cap Pharma											**182.5**	**11.6**	**4.2**	**18.8**	**16.1**			**2.8**	**2.8**	**14.4**	**8.4**	**7.3**	**14.6**	**0.8%**	**0.8%**	**1.3%**	**-1%**	**18%**		**20%**	**37%**							
Galapagos	NED	EUR	Buy	66	110	67%		na	na	na	4.5	-16.7	-18.8					na	na	na	na	na	na	na	na	na			0.0%			0.0%	0.0	0.0	0.0	0.0%	0.0%	0.0%	0.0%
Genmab	DEN	DKK	Buy	2,181	2,750	26%	60.58	na	na	na	22.6	89.8	47.2	48.0	38.4			na	29.0	16.5	14.2	43.0	36.6	0.0%	0.0%	2.2%	65%		-4.3%	28%		7.2%	na	-3.5	-3.5	7.1%	7.1%	40.3%	40.8%
Grifols	ESP	EUR	Hold	23	25	9%	17.79	na	na	na	16.4	21.3	18.1	16.3	14.8			11.3	10.5	3.4	3.3	28.3	24.5	1.8%	2.1%	4.5%	12%		12.0%	5%		4.6%	1.5	3.4	3.0	5.7%	5.7%	-25.7%	-25.7%
Hutchison China MediTech	CHN	US$	Buy	29	40	37%	-18.69	na	na	na	4.1	-20.4	-25.9	na	na			-11.7	-14.3	11.9	8.7	-13.8	-16.1	0.0%	0.0%	-7.2%	-46%		-52.5%	48%		49.5%	na	1.2	0.1	-0.1%	-1.1%	45.7%	31.6%
Idorsia	SWI	CHF	Buy	26	35	37%	-7.80	41	62%	-9.2	4.0	-6.8	-7.9					-6.5	-8.0	86.2	38.7	-6.8	-8.2	0.0%	0.0%	-17.7%			-3.1%			62.7%	na	-0.8	-1.2	-2.5%	-2.0%	-13.6%	-17.6%
Ipsen	GER	EUR	Hold	77	80	4%		na	na	na	7.7	10.5	10.6	10.5	10.6			na	na	na	na	na	na	na	na	na	3%	3%	2.6%			2.3%	4.3			15.9%	15.9%	32.5%	32.5%
MorphoSys	GER	EUR	Buy	76	116	53%	-25.45	na	na	na	2.9	-14.8	-46.4	na	na			-13.2	-31.3	12.7	6.7	-51.5	43.7	0.0%	0.0%	-2.0%	-66%	21%	37.3%	13%	37%	19.1%	-0.4	0.6	0.8	-3.1%	-3.1%	-21.6%	-21.6%
Recordati	ITA	EUR	Hold	46	45	-2%		na	na	na	3.6	9.8	8.0	9.8	8.0			na	na	na	na	na	na	na	na	na	21%	29%	20.8%			6.2%	0.6			6.2%	6.7%	-6.1%	-10.4%
SOBI	SWE	SEK	Hold	141	130	-8%	8.54	na	na	na	5.0	15.0	12.2	9.3	8.7			8.9	8.5	3.5	3.3	12.3	11.5	0.0%	0.0%	11.3%	7%		12.0%	6%		5.2%	1.3	1.8	1.0	-1.7%	-1.2%	-24.6%	-18.9%

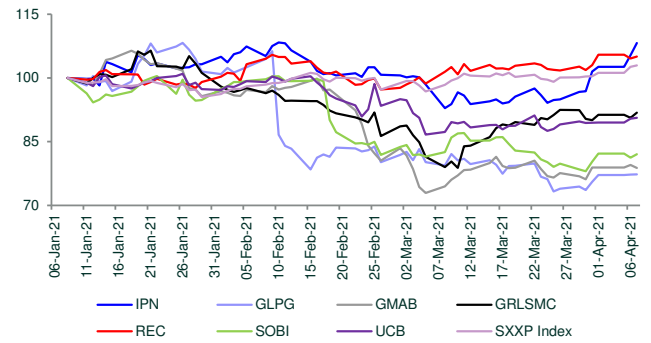
Source : Deutsche Bank, Bloomberg Finance LP

Figure 25: Global Pharmaceuticals valuation comps

Stock	Cty	FX	% Free float	Rating	Price 19-Apr-21	Target price	Upside/ downside (%) to PT	PT implied 2020 P/E (x)	PT implied 2021 P/E (x)	NPV/ sh	NPV Up/ down-side	NPV implied '21 P/E	Mcap (lc; bn)	Mcap (US$bn)	Cons Core P/E 2021	Cons Core P/E 2022	DB Adj. P/E 2021	DB Adj. P/E 2022	DB Adj. P/E 2023	DB Adj. P/E 2024	P/E prem/ disc	DB IFRS PE 2021	EV/EBITDA 2021	EV/EBITDA 2022	EV/EBITDA 2023	EV/EBITDA 2024	EV/Sales 2020	EV/Sales 2021	EV/FCF 2021	EV/FCF 2022	EV/FCF 2023	EV/FCF 2024	Dividend yield 2021	Dividend yield 2022	Dividend yield 2023	Dividend yield 2024	FCF yield 2021	FCF yield 2022	FCF yield 2023	FCF yield 2024
EU major Pharma														**1,087**	**15.8**	**13.9**	**16.4**	**14.5**	**13.2**	**12.3**			**11.1**	**10.0**	**9.4**	**9.0**	**4.0**	**3.7**	**8.4**	**16.2**	**14.8**	**14.2**	**3.6%**	**3.9%**	**4.1%**	**4.3%**	**4.6%**	**7.3%**	**8.0%**	**8.4%**
AstraZeneca	UK	US$	96%	**Buy**	7,380	**10,200**	38%	32.6	26.9	9,714.8	32%	25.6	106	146	20.4	15.9	19.4	13.9	12.2	10.5	15%	15.3	10.2	7.1	6.3	5.6	3.5	2.8	18.4	15.5	12.7	12.3	3.1%	3.7%	3.9%	4.1%	4.7%	5.6%	6.8%	7.1%
Bayer AG	GER	EUR	100%	**Buy**	54.00	**66**	22%	15.2	17.4	63.1	17%	16.7	53	64	9.5	8.5	14.3	12.9	11.0	11.3	-16%	20.7	8.2	7.5	7.0	7.2	2.1	2.1	-52.1	14.6	13.7	13.3	3.7%	3.9%	4.4%	4.3%	-3.2%	11.3%	12.0%	12.4%
GSK	UK	GBP	100%	**Sell**	1,346	**1,150**	-15%	10.0	12.1	2,039.4	51%	21.5	68	94	13.4	12.0	14.2	13.5	12.3	11.5	-16%	19.0	10.3	9.8	9.2	8.8	2.8	2.7	17.7	15.2	13.7	13.3	5.9%	5.9%	5.9%	5.9%	7.9%	9.3%	10.2%	10.6%
Novartis	SWI	US$	96%	**Buy**	80.87	**100**	24%	18.6	17.6	102.4	27%	18.0	183	199	14.0	12.9	14.2	13.1	12.2	11.4	-16%	26.9	11.1	10.4	10.0	9.7	4.0	3.8	16.8	15.3	14.6	14.1	3.6%	3.8%	4.0%	4.3%	5.9%	6.5%	6.8%	7.1%
Novo Nordisk	DEN	DKK	91%	**Buy**	449.25	**500**	11%	27.9	25.7	528.0	18%	27.1	1,034	167	23.3	20.9	23.1	20.8	19.3	17.6	36%	23.1	16.5	15.0	14.2	13.3	7.5	6.9	24.8	22.4	20.7	19.7	2.2%	2.4%	2.6%	2.9%	3.9%	4.3%	4.6%	4.9%
Roche	SWI	CHF	100%	**Hold**	309.20	**325**	5%	17.0	16.7	343.7	11%	17.6	267	290	15.9	15.0	15.8	14.7	13.6	12.7	-6%	20.5	11.0	10.4	10.0	10.0	4.6	4.4	15.8	14.8	14.1	13.1	3.0%	3.1%	3.2%	3.3%	6.6%	7.0%	7.4%	8.0%
Sanofi	FRA	EUR	86%	**Sell**	85.01	**70**	-18%	12.0	11.3	100.3	18%	16.2	107	128	13.9	12.4	13.8	12.5	12.0	11.2	-19%	16.5	10.2	9.5	9.2	8.7	3.2	3.1	17.6	16.0	14.1	13.7	4.0%	4.4%	4.6%	4.9%	6.6%	7.3%	8.2%	8.5%
EU smid-cap Pharma														**191**	**12.8**	**11.7**							**7.4**	**6.0**	**18.3**	**11.3**	**11.4**	**7.1**	**17.8**	**18.4**	**8.8**	**9.2**	**0.7%**	**0.7%**	**0.9%**	**1.0%**	**1.3%**	**2.7%**	**4.7%**	**6.3%**
Evotec (EUR)			80%	**Hold**	EUR 33.6	**EUR 29.0**	-14%	713.2	121.5	na	na	na	5	7	162.3	118.3	na	na	na	na			47.5	41.1	35.9	31.3	10.0	9.0	155.8	79.2	67.7	59.2	0.0%	0.0%	0.0%	0.0%	0.7%	1.4%	1.7%	1.9%
Galapagos (EUR)	NED	EUR	64%	**Buy**	DKK 65.7	**DKK 110.0**	67%			na	na	na	4	5	-16.7	-18.8	na	na	na	na			na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na
Genmab (DKK)	DEN	DKK	99%	**Buy**	DKK 2,181.0	**DKK 2,750.0**	26%	174.5	60.6	na	na	na	140	23	89.8	47.2	48.0	38.4	31.0	23.4	na	48.0	na	29.0	23.6	17.7	16.5	14.2	43.0	36.6	29.6	22.0	0.0%	0.0%	0.0%	0.0%	2.2%	2.6%	3.2%	4.3%
Grifols (EUR)	ESP	EUR	83%	**Hold**	EUR 22.9	**EUR 25.0**	9%	20.6	17.8	na	na	na	14	16	21.3	18.1	16.3	14.8	13.3	12.1	na	18.8	11.3	10.5	9.9	9.6	3.4	3.3	28.3	24.5	24.5	24.5	1.8%	2.1%	2.4%	2.7%	4.5%	5.2%	5.2%	5.2%
Hikma (USD)	UK	GBP	62%	**NR**	EUR 2,367.0	**na**				na	na	na	0	0	12.9	11.2	17.8	na	na	na	na	17.8	0.2	0.2	0.2	0.2	0.1	0.1	0.4	0.4	0.4	0.4	1.6%	na	na	na	5.5%	na	na	na
Hutchison China MediTech	CHN	US$		**Buy**	USD 29.3	**USD 40.0**	37%	(44.4)	(18.7)	na	na	na	4	4	-20.4	-25.9	na	na	na	na			-11.7	-14.3	-63.7	na	11.9	8.7	-13.8	-16.1	-87.0	na	0.0%	0.0%	0.0%	na	-7.2%	-6.2%	-1.1%	na
Idorsia A shares (CHF)	SWI	CHF	54%	**Buy**	CHF 25.5	**CHF 35.0**	37%	(11.2)	(7.8)	4128%	62%	-920%	4	4	-6.8	-7.9	na	na	na	na			-6.5	-8.0	-11.8	-46.5	86.2	38.7	-6.8	-8.2	-11.6	-71.1	0.0%	0.0%	0.0%	0.0%	-17.7%	-14.6%	-10.3%	-1.7%
Indivior (USD)			99%	**NR**	134.0p	**na**				na	na	na	1	1	10.7	7.4	14.8	10.3	6.4	6.4	na	14.8	3.1	2.3	na	na	0.7	0.6	3.7	6.6	3.4	3.4	0.0%	0.0%	na	na	9.3%	5.2%	10.2%	10.2%
Ipsen (EUR)	GER	EUR	42%	**Hold**	77.2p	**80.0p**	4%	11.4	10.9	na	na	na	6	8	10.5	10.6	10.5	10.6	10.2	10.4	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na
Lundbeck (DKK)	UK	US$	31%	**NR**	DKK 195.0	**na**				na	na	na	39	6	15.0	12.6	15.0	12.6	9.8	9.8	na	15.0	11.6	9.9	7.8	7.8	2.7	2.5	19.1	14.1	10.5	10.5	1.6%	2.1%	3.1%	3.1%	6.0%	8.2%	10.9%	10.9%
Merck (EUR)	UK	US$	100%	**Buy**	EUR 148.9	**EUR 146.0**	-2%	21.8	22.1	na	na	na	65	78	21.5	19.4	22.5	20.7	19.4	18.1	na	31.4	15.2	14.0	13.3	12.5	4.2	4.0	27.1	24.0	21.9	20.0	1.0%	1.0%	1.0%	1.1%	4.4%	5.0%	5.4%	6.0%
Morphosys (EUR)	GER	EUR	95%	**Buy**	EUR 75.6	**116**	53%	38.5	(25.4)	na	na	na	2	3	-14.8	-46.4	na	na	na	37.9	na	-16.6	-13.2	-31.3	142.8	24.5	12.7	6.7	-51.5	43.7	17.8	10.6	0.0%	0.0%	0.0%	0.0%	-2.0%	2.3%	5.7%	9.5%
Polyphor (CHF)			94%	**NR**	CHF 7.4	**na**				na	na	na	0	0	-134.5	-4.1	na	na	na	na	na	na	4.8	-0.9	51.1	51.1	0.3	0.6	-1.9	7.0	5.5	5.5	na	na	na	na	-10.6%	2.9%	3.6%	3.6%
Recordati (EUR)	ITA	EUR	72%	**Hold**	CHF 45.7	**CHF 45.0**	-2%	11.6	9.7	na	na	na	3	4	9.8	8.0	9.8	8.0	6.7	6.0	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na
Stada Arzneimittel AG (EUR)			6%	**NR**	EUR 80.4	**na**				na	na	na	0	0			na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na
SOBI (SEK)	SWE	SEK	55%	**Hold**	SEK 141.3	**SEK 130.0**	-8%	9.1	8.5	na	na	na	42	5	15.0	12.2	9.3	8.7	8.0	7.9	na	14.2	8.9	8.5	8.0	7.9	3.5	3.3	12.3	11.5	10.6	10.7	0.0%	0.0%	0.0%	0.0%	11.3%	12.1%	13.1%	13.0%
UCB (EUR)	BEL	EUR	62%	**NR**	EUR 82.2	**na**				na	na	na	15	18	14.1	14.2	14.1	14.2	13.1	13.1	na	14.1	9.6	9.5	8.9	8.9	2.7	2.8	15.2	15.2	13.2	na	1.6%	1.7%	1.8%	1.8%	6.2%	6.2%	7.2%	na
Vifor Pharma (CHF)	SWI	CHF	72%	**Hold**	CHF 133.6	**CHF 125.0**	-6%	25.1	24.3	na	na	na	9	9	28.7	23.4	26.0	21.7	18.9	16.8	na	44.6	15.3	13.2	11.9	10.7	5.1	4.6	18.3	19.2	16.8	15.0	1.5%	1.5%	1.5%	1.5%	5.5%	5.2%	6.0%	6.7%
German Health Care														**125**	**65.1**	**17.8**							**8.7**	**6.3**	**27.1**	**11.5**	**4.0**	**3.3**	**20.1**	**28.1**	**21.5**	**18.3**	**1.2%**	**1.0%**	**1.2%**	**1.3%**	**7.1%**	**5.4%**	**6.9%**	**7.9%**
EU MedTech														**174**	**33.0**	**27.9**							**21.3**	**18.6**	**17.1**	**16.3**	**5.8**	**5.3**	**40.8**	**33.1**	**29.3**	**28.2**	**1.1%**	**1.2%**	**1.4%**	**1.4%**	**2.7%**	**3.0%**	**3.5%**	**3.6%**
US Major Pharma														**862**	**12.8**	**12.2**							**9.4**	**9.3**	**9.1**	**9.1**	**4.0**	**4.0**	**14.3**	**13.4**	**13.1**	**13.1**	**3.4%**	**3.6%**	**3.7%**	**3.7%**	**9.2%**	**10.0%**	**10.2%**	**10.2%**
Bristol-Myers Squibb	US	US$	98%	**NR**	65.46	**na**				na	na	na	108	108	8.8	8.1	na	na	na	na	na	na	4.1	4.0	3.9	3.9	2.3	2.2	6.4	6.2	5.5	5.5	2.9%	3.0%	3.2%	3.2%	15.0%	15.5%	17.6%	17.6%
Eli Lilly	US	US$	88%	**NR**	189.25	**na**				na	na	na	175	175	22.9	21.6	na	na	na	na	na	na	17.2	16.6	15.3	15.3	6.4	6.4	27.1	23.8	22.5	22.5	1.8%	1.9%	2.0%	2.0%	3.8%	4.3%	4.5%	4.5%
Merck	US	US$	99%	**NR**	77.47	**na**				na	na	na	200	200	11.9	10.8	na	na	na	na	na	na	9.7	9.0	8.7	8.7	4.1	3.9	14.7	13.8	13.5	13.5	3.4%	3.7%	3.9%	3.9%	7.3%	7.8%	8.0%	8.0%
PFIZER INC.	US	US$	100%	**NR**	38.57	**na**				na	na	na	218	218	11.7	12.6	na	na	na	na	na	na	10.3	11.3	11.1	11.1	3.8	4.5	14.3	16.1	15.9	15.9	4.0%	4.2%	4.4%	4.4%	7.5%	6.7%	6.8%	6.8%
AbbVie	US	US$	98%	**NR**	107.91	**na**				na	na	na	161	161	8.7	7.9	na	na	na	na	na	na	5.9	5.5	6.2	6.2	3.2	3.0	9.1	7.2	8.0	8.0	4.7%	5.1%	5.2%	5.2%	12.2%	15.4%	14.0%	14.0%
US vs EU major multiple																							-15%	-6%	-4%	0%			70%	-17%	-12%	-8%	0%	0%	0%	-1%	5%	3%	2%	2%
US MedTech														**1,196**	**26.2**	**22.8**							**19.6**	**17.6**	**16.3**	**14.2**	**6.0**	**5.6**	**32.8**	**27.2**	**26.6**	**22.9**	**0.9%**	**1.0%**	**1.1%**	**2.0%**	**5.2%**	**6.0%**	**6.2%**	**5.2%**
US Spec and Drug Delivery														**104**	**8.6**	**7.9**							**9.2**	**8.8**	**8.5**	**8.5**	**3.3**	**3.2**	**16.6**	**16.1**	**18.3**	**18.3**	**0.7%**	**0.9%**	**na**	**na**	**21.9%**	**28.3%**	**12.4%**	**12.4%**
US Biotech (large cap)														**514**	**7.4**	**2.2**							**1.2**	**-9.0**	**26.3**	**26.3**	**9.9**	**7.8**	**1.1**	**-27.4**	**27.3**	**27.3**	**1.1%**	**1.2%**	**1.9%**	**1.9%**	**5.6%**	**5.9%**	**6.7%**	**6.7%**
Alnylam Pharmaceuticals	US	US$	99%	**NR**	138.88	**na**				na	na	na	28	28	-25.4	-54.2	na	na	na	na	na	na	-45.1	-104.7	109.7	109.7	32.4	20.5	-66.8	-235.2	95.6	95.6	0.0%	0.0%	na	na	-2.6%	-0.8%	1.8%	1.8%
Amgen	US	US$	100%	**NR**	255.71	**na**				na	na	na	156	156	15.2	14.1	na	na	na	na	na	na	10.9	10.6	10.2	10.2	6.3	6.1	15.8	15.4	14.8	14.8	2.7%	2.9%	3.1%	3.1%	6.8%	7.0%	7.2%	7.2%
Biogen	US	US$	99%	**NR**	270.31	**na**				na	na	na	51	51	14.8	13.6	na	na	na	na	na	na	12.4	11.9	10.9	10.9	4.9	4.9	17.0	16.8	16.6	16.6	0.0%	0.0%	0.0%	0.0%	6.0%	6.0%	6.1%	6.1%
Celgene	US	US$	100%	**NR**	108.24	**na**				na	na	na	79	79			na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na
Gilead	US	US$	100%	**NR**	66.87	**na**				na	na	na	85	85	9.4	10.1	na	na	na	na	na	na	6.6	7.3	6.7	6.7	3.6	3.7	9.5	10.9	9.4	9.4	4.1%	4.3%	4.6%	4.6%	10.9%	9.5%	11.1%	11.1%
Regeneron Pharmaceuticals Inc	US	US$	97%	**NR**	502.60	**na**				na	na	na	58	58	10.8	12.4	na	na	na	na	na	na	9.0	9.9	9.1	9.1	4.5	4.7	12.7	12.6	13.2	13.2	0.0%	0.0%	0.0%	0.0%	7.3%	7.4%	7.1%	7.1%
Vertex Pharmaceuticals	US	US$	100%	**NR**	219.39	**na**				na	na	na	57	57	19.4	17.1	na	na	na	na	na	na	13.2	11.2	10.8	10.8	7.7	6.9	18.4	15.2	14.1	14.1	0.0%	0.0%	na	na	5.1%	6.1%	6.6%	6.6%
US Biotech (s/mid cap)														**85**	**-2.4**	**-9.6**							**44.4**	**8.6**	**0.5**	**0.5**	**6.8**	**5.6**	**48.5**	**25.9**	**6.8**	**6.8**	**0.0%**	**0.0%**	**0.0%**	**0.0%**	**1.9%**	**2.0%**	**4.5%**	**4.5%**
Achillion Pharma	US	US$	97%	**NR**	6.76	**na**				na	na	na	1	1			na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na
Alexion	US	US$	95%	**NR**	163.68	**na**				na	na	na	37	37	12.7	11.6	na	na	na	na	na	na	10.1	9.9	9.4	9.4	5.7	5.3	13.3	12.4	11.5	11.5	na	na	na	na	na	na	na	na
Arrowhead Research	US	US$	95%	**NR**	67.65	**na**				na	na	na	9	9	-129.3	-114.7	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	na	0.0%	0.0%	0.0%	0.0%	2.8%	0.4%	3.9%	3.9%
BioMarin	US	US$	99%	**NR**	79.40	**na**				na	na	na	14	14	76.4	33.7	na	na	na	na	na	na	190.2	37.5	16.5	16.5	7.6	6.1	212.2	106.2	31.6	31.6	0.0%	0.0%	0.0%	0.0%	0.5%	0.9%	3.0%	3.0%
Neurocrine	US	US$	99%	**NR**	96.58	**na**				na	na	na	9	9	24.8	18.1	na	na	na	na	na	na	21.0	13.3	9.5	9.5	7.3	5.8	20.4	15.9	11.4	11.4	0.0%	0.0%	0.0%	0.0%	4.7%	6.0%	8.4%	8.4%
Sarepta	US	US$	95%	**NR**	71.80	**na**				na	na	na	5	5	-12.0	-17.9	na	na	na	na	na	na	-10.7	-28.3	-40.5	-40.5	7.5	5.4	-17.2	-16.7	-30.0	-30.0	0.0%	0.0%	na	na	-5.3%	-5.5%	-3.1%	-3.1%
United Therapeutics	US	US$	98%	**NR**	203.73	**na**				na	na	na	9	9	13.2	11.6	na	na	na	na	na	na	11.5	10.4	7.5	7.5	5.6	5.1	14.1	11.9	9.6	9.6	na	na	na	na	7.0%	8.3%	10.2%	10.2%

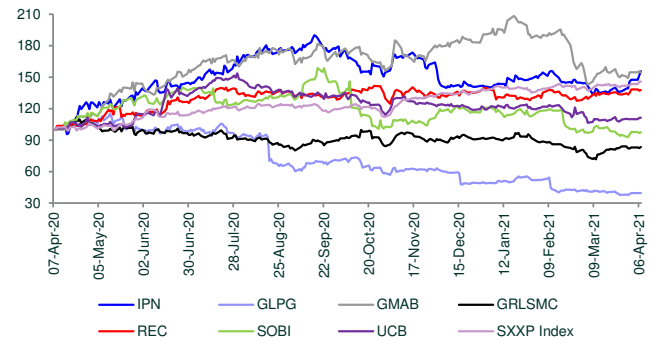
Source : Deutsche Bank, Bloomberg Finance LP

Figure 26: 3m FX Adjusted (into $) performance



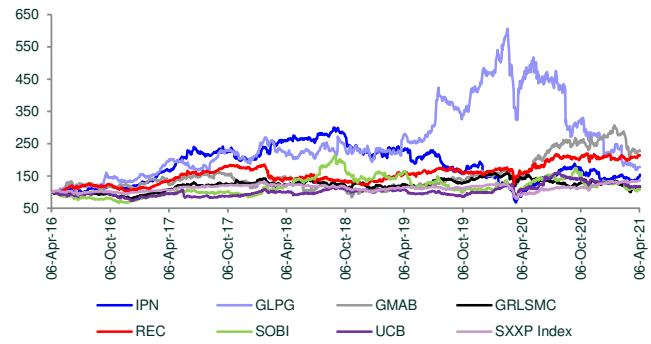
Source : Bloomberg

Figure 27: 1yr FX Adjusted (into $) performance



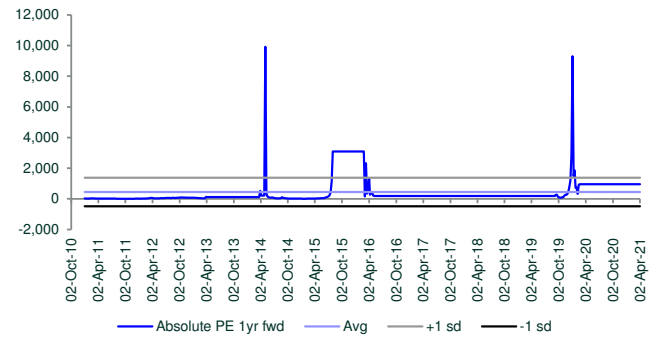
Source : Bloomberg

Figure 28: 5yr FX Adjusted (into $) performance



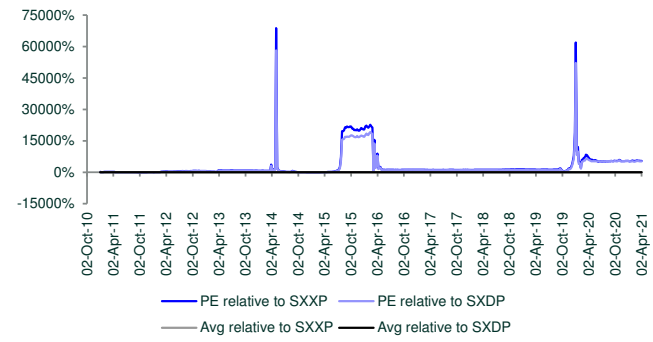
Source : Bloomberg

Figure 29: Galapagos PE performance



Source : Bloomberg

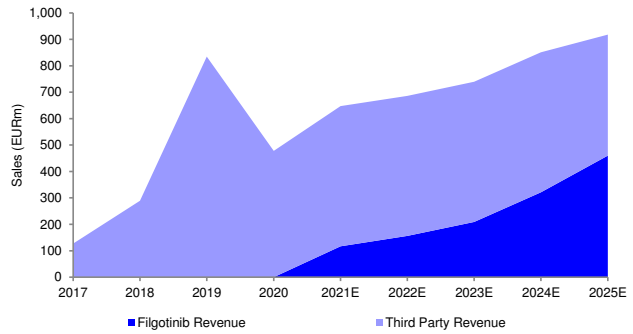
Figure 30: Galapagos PE performance relative to market



Source : Bloomberg

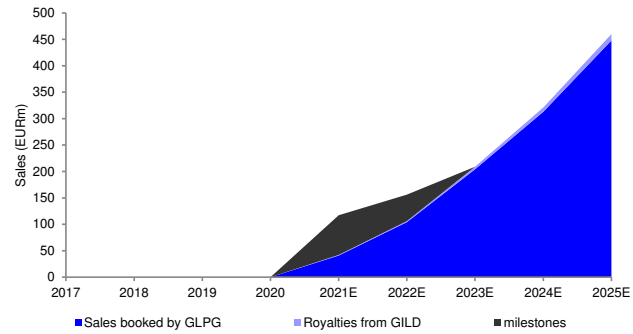
Business snapshot

Figure 31: Total Revenue



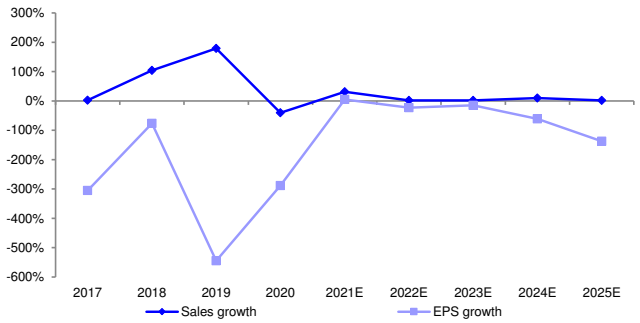
Source : Deutsche Bank estimate;company data

Figure 32: Filgotinib Total Revenue



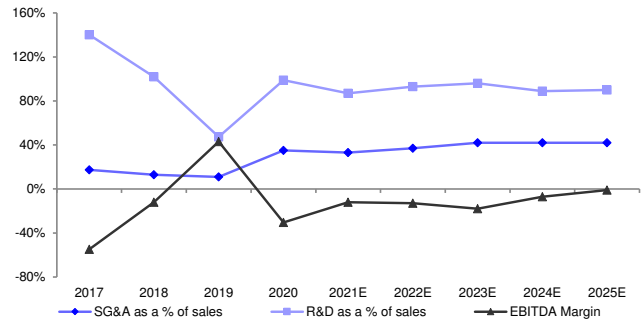
Source : Deutsche Bank estimate;company data

Figure 33: Sales/EPS Growth Profile



Source : Deutsche Bank estimate;company data

Figure 34:Cost/Margin Profile



Source : Deutsche Bank estimate;company data

Appendix 1

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Company	Ticker	Recent price*	Disclosure
Galapagos	GLPG.AS	65.74 (EUR) 16 Apr 2021	2, 14, 15

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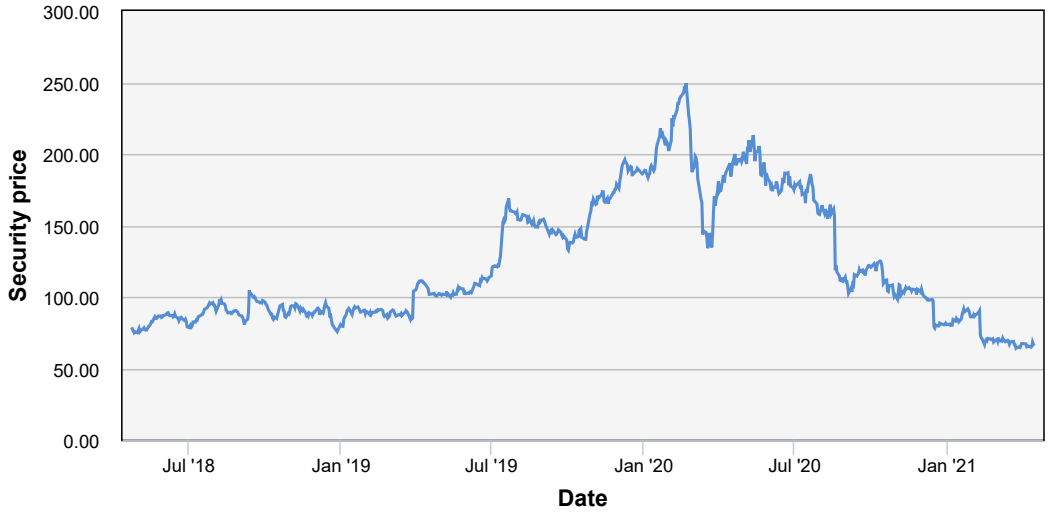
Historical recommendations and target price: Galapagos (GLPG.AS)

(as of 04/16/2021)



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Hold
Sell
Not Rated
Suspended Rating

** Analyst is no longer at Deutsche Bank

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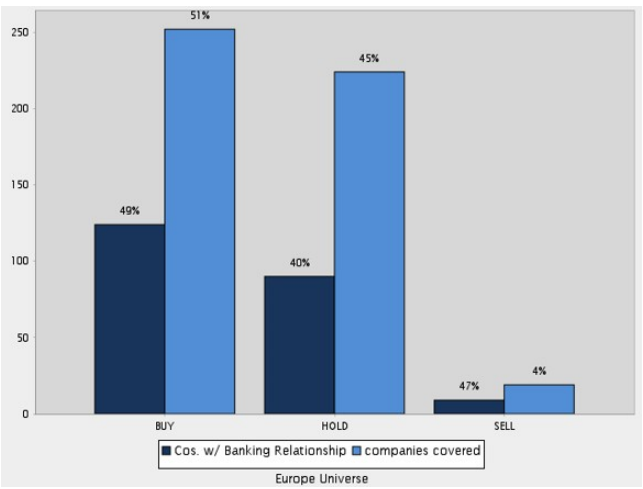

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