Biotechnology

PBMD - NASDAQ November 23, 2016

Intraday Price 11/23/2016	**$0.82**
Rating:	Buy
12-Month Target Price:	$5.00
52-Week Range:	$0.72 - $1.54
Market Cap (M):	57
Shares O/S (M):	69.1
Float:	0.0%
Avg. Daily Volume (000):	73
Debt (M):	$0.0
Dividend:	$0.00
Dividend Yield:	0.00%
Risk Profile:	Speculative
Fiscal Year End:	June

Total Expenses ('000)

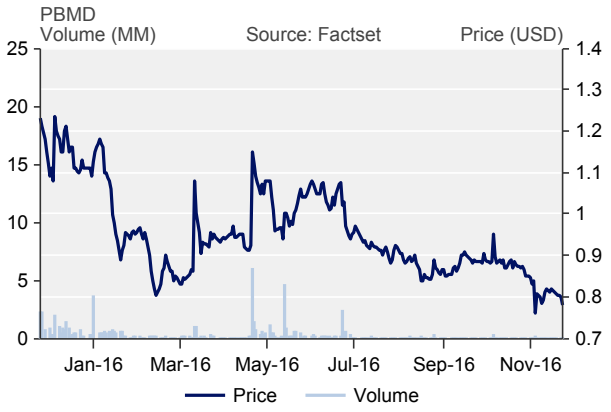
	2016A	2017E	2018E
H1	7,006	6,725	7,061
H2	5,181	7,285	7,650
FY	12,187	14,010	14,711

Pretax Income ('000)

	2016A	2017E	2018E
H1	(6,928)	(1,925)	2,539
H2	(5,079)	(2,085)	2,750
FY	(12,006)	(4,010)	5,289

GAAP EPS

	2016A	2017E	2018E
H1	(0.11)	(0.03)	0.04
H2	(0.08)	(0.03)	0.04
FY	(0.20)	(0.06)	0.08



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Prima Biomed Ltd. Buy

Expanding the Footprint in China - WuXi Biologics Comes On Board for Manufacturing of IMP321

Summary

- **Prima announced that the company has entered into an agreement with China-based WuXi Biologics (a WuXi Apptec group company) for clinical and commercial manufacturing of IMP321 (soluble LAG-3).**
- **The agreement with WuXi is for worldwide manufacturing and supply, but will not include the Greater China region. Prima's partner Eddingpharm obtained rights to develop and manufacture IMP321 in China, Macau, Taiwan and Hong Kong in 2013.**
- **IMP321 is an activator of dendritic cells that subsequently ramps up the T-cell response to target tumor cells. By delivering IMP321 directly to dendritic cells in the tumor, those dendritic cells could immediately begin sampling tumor antigens for T-cell activation.**
- **IMP321 is the subject of two ongoing studies; A phase IIb study in breast cancer in combination with chemotherapy and a phase I ("TACTI-mel") study (N=24) in melanoma of IMP321 (soluble LAG-3) in combination with Merck's Keytruda (anti-PD1). Both studies are expected to report interim data in the coming months.**
- **Conclusion. We see Prima expanding its footprint in China as a strategic positive. In addition, we are also seeing the immune-oncology space migrate to combination approaches. China continues to emerge in the immune oncology space, particularly for combination approaches, with companies like Beigene (BGNE - $31.62 - Buy) developing their own PD-1 in combination with small molecules like BTK and PARP inhibitors. Prima in our view, with partnerships in China and combination approaches in the clinic, is ideally positioned to capture this opportunity too.**

Details

IMP321 is Prima Biomed's lead LAG-3 candidate, and it's in development as an immune adjuvant or immune stimulator. IMP321 is a soluble dimeric recombinant form of LAG-3Ig, a fusion protein used to increase the immune response to tumors by stimulating dendritic cells through high affinity binding to MHC class II molecules on the dendritic cell surface. LAG-3 is one of two proteins shown to be able to properly condition dendritic cells (and monocytes) to undergo maturation and step up the stimulation of antigen targeting T-cells (the other is CD40 ligand). What's important to note is that both LAG-3 and CD40 can do this without inflammation. IMP321 was developed by Dr. Frédéric Triebel in the late 1990s as a dendritic-cell activator. IMP321 has been shown to be highly efficacious as a vaccine adjuvant to inhibit tumor growth in a number of models of both cancer and infectious disease. The protein is safe and non-immunogenic, and has already shown efficacy in humans. When used at low doses, it can be used as a T-cell adjuvant for cancer vaccines. At higher doses, IMP321 can be combined with cancer chemotherapy to ramp up the immune response by driving dendritic cells and monocytes to increase tumor antigen presentation. One of the hallmarks of cytotoxic chemotherapy, in addition to the direct killing of tumor cells, is chemotherapy-induced tumor antigen presentation.

Valuation. We assume a royalty stream for each product, initially with IMP321 and IMP701 in 2020 and followed by IMP731 in 2023. We apply a 30% discount to our free-cash-flow, discounted EPS, and sum-of-the-parts models, which are equally weighted to derive a 12-month price target of $5.

DISCLOSURES

Prima Biomed Ltd. Rating History as of 11/21/2016

powered by: BlueMatrix

BeiGene, Ltd. Rating History as of 11/21/2016

powered by: BlueMatrix

Maxim Group LLC Ratings Distribution — **As of: 11/22/16**

		% of Coverage Universe with Rating	% of Rating for which Firm Provided Banking Services in the Last 12 months
Buy	Fundamental metrics and/or identifiable catalysts exist such that we expect the stock to outperform its relevant index over the next 12 months.	**77%**	**27%**
Hold	Fundamental metrics are currently at, or approaching, industry averages. Therefore, we expect this stock to neither significantly outperform nor underperform its relevant index over the next 12 months.	**21%**	**20%**
Sell	Fundamental metrics and/or identifiable catalysts exist such that we expect the stock to underperform its relevant index over the next 12 months.	**2%**	**0%**

**See valuation section for company specific relevant indices*

I, Jason McCarthy, Ph.D., attest that the views expressed in this research report accurately reflect my personal views about the subject security and issuer. Furthermore, no part of my compensation was, is, or will be directly or indirectly related to the specific recommendation or views expressed in this research report.

I, Jason Kolbert, attest that the views expressed in this research report accurately reflect my personal views about the subject security and issuer. Furthermore, no part of my compensation was, is, or will be directly or indirectly related to the specific recommendation or views expressed in this research report.

I, Gabrielle Zhou, attest that the views expressed in this research report accurately reflect my personal views about the subject security and issuer. Furthermore, no part of my compensation was, is, or will be directly or indirectly related to the specific recommendation or views expressed in this research report.

The research analyst(s) primarily responsible for the preparation of this research report have received compensation based upon various factors, including the firm's total revenues, a portion of which is generated by investment banking activities.

Maxim Group makes a market in Prima Biomed Ltd. and BeiGene, Ltd.

Maxim Group expects to receive or intends to seek compensation for investment banking services from Prima Biomed Ltd. and BeiGene, Ltd. in the next 3 months.

PBMD: For Prima Biomed, we use the BTK (Biotechnology Index) as the relevant index.
BGNE: For BeiGene, we use the BTK (NYSE Biotechnology Index) as the relevant index.

Valuation Methods

PBMD: Our therapeutic model assumes a royalty structure for each LAG-3 product, initially with IMP701 and IMP321 in 2020 and followed by IMP731 in 2023. Our models assume risk adjustments for each product based on the stage(s) of development. We then apply a 30% discount to our free-cash-flow, discounted EPS, and sum-of-the-parts models, which are equally weighted to derive a price target.
BGNE: We use free-cash-flow-to-the-firm (FCFF), discounted-EPS, and sum-of-the-parts models, with a risk rate of 15%, equally weighted and averaged, to derive our price target of $41.

Price Target and Investment Risks

PBMD: Aside from general market and other economic risks, risks particular to our price target and rating for Prima Biomed include: (1) Development—To date, LAG-3 checkpoint modulators have not been approved; (2) Regulatory—The company's ongoing and future studies may not be sufficient to gain approval; (3) Commercial—The company lacks commercial infrastructure to support a launch if approved; (4) Financial—The company is not yet profitable and may need to raise additional capital to fund operations.
BGNE: Aside from general market and other economic risks, risks particular to our price target and rating for BeiGene include: clinical trials development and results, and product commercialization, as well as future financing. (1) The company's drug candidates may not be successful in current and future clinical trials. (2) There can be no assurances that the products will be successfully commercialized and achieve market share and generate significant revenues. (3) The company is not yet profitable and may need to raise additional capital to continue funding operations.

RISK RATINGS

Risk ratings take into account both fundamental criteria and price volatility.

Speculative – Fundamental Criteria: This is a risk rating assigned to early-stage companies with minimal to no revenues, lack of earnings, balance sheet concerns, and/or a short operating history. Accordingly, fundamental risk is expected to be significantly above the industry. Price Volatility: Because of the inherent fundamental criteria of the companies falling within this risk category, the price volatility is expected to be significant with the possibility that the investment could eventually be worthless. Speculative stocks may not be suitable for a significant class of individual investors.

High – Fundamental Criteria: This is a risk rating assigned to companies having below-average revenue and earnings visibility, negative cash flow, and low market cap or public float. Accordingly, fundamental risk is expected to be above the industry. Price Volatility: The price volatility of companies falling within this category is expected to be above the industry. High-risk stocks may not be suitable for a significant class of individual investors.

Medium – Fundamental Criteria: This is a risk rating assigned to companies that may have average revenue and earnings visibility, positive cash flow, and is fairly liquid. Accordingly, both price volatility and fundamental risk are expected to approximate the industry average.

Low – Fundamental Criteria: This is a risk rating assigned to companies that may have above-average revenue and earnings visibility, positive cash flow, and is fairly liquid. Accordingly, both price volatility and fundamental risk are expected to be below the industry.

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