Zacks Small-Cap Research

March 8, 2016
Grant Zeng, CFA
312-265-9466
gzeng@zacks.com

scr.zacks.com
10 S. Riverside Plaza, Chicago, IL 60606

Advaxis Inc. (ADXS-NASDAQ)

ADXS: Phase III of ADXS-HPV for cervical cancer will be initiated in mid-2016---Buy

Current Recommendation	**Buy**
Prior Recommendation	Hold
Date of Last Change	11/06/2013
Current Price (03/08/16)	$8.56
12-month Target Price	**$25.00**

OUTLOOK

Advaxis is a Listeria based immunotherapy company focused on the development of immunotherapeutics for cancer treatment. We are optimistic about the Company's unique Listeria platform technology which has advantages over its peers.

The Company's lead drug candidate ADXS-HPV will be in Phase III trials for the treatment of cervical cancer in mid-2016. Recent collaborations with Merck and MedImmune may lead to license deals for Advaxis.

We rate its shares Buy.

SUMMARY DATA

52-Week High	**$28.77**
52-Week Low	**$5.46**
One-Year Return (%)	**-30.58**
Beta	**1.26**
Average Daily Volume (sh)	**884,686**
Shares Outstanding (mil)	**34**
Market Capitalization ($mil)	**$292**
Short Interest Ratio (days)	**N/A**
Institutional Ownership (%)	**N/A**
Insider Ownership (%)	**N/A**
Annual Cash Dividend	**$0.00**
Dividend Yield (%)	**0.00**
5-Yr. Historical Growth Rates	
Sales (%)	**N/A**
Earnings Per Share (%)	**N/A**
Dividend (%)	**N/A**
P/E using TTM EPS	**N/A**
P/E using 2011 Estimate	**N/A**
P/E using 2012 Estimate	**N/A**
Zacks Rank	**N/A**

Risk Level	**Above Avg.,**
Type of Stock	**N/A**
Industry	**Med Products**
Zacks Rank in Industry	**N/A**

ZACKS ESTIMATES

Revenue
(in millions of $)

	Q1 (Jan)	Q2 (Apr)	Q3 (Jul)	Q4 (Oct)	Year (Oct)
2015	0.00 A	0.00 A	0.00 A	0.00 A	0.00 A
2016	0.25 A	0.25 E	0.25 E	0.25 E	1.00 E
2017					1.00 E
2018					30.00 E

Earnings per Share
(EPS is operating earnings before non recurring items)

	Q1 (Jan)	Q2 (Apr)	Q3 (Jul)	Q4 (Oct)	Year (Oct)
2015	-$0.33 A	-$0.52 A	-$0.44 A	-$0.33 A	-$1.62 A
2016	-$0.59 A	-$0.56 E	-$0.61 E	-$0.61 E	-$2.36 E
2017					-$2.48 E
2018					-$1.33 E

Zacks Projected EPS Growth Rate - Next 5 Years % **N/A**

© Copyright 2016, Zacks Investment Research. All Rights Reserved.

WHAT'S NEW

Update on Axalimogene Filolisbac (ADXS-HPV)

FDA Lifts Clinical Hold

On December 16, the FDA lifted the clinical hold on all of the company's Investigational New Drug (IND) applications for its three product candidates: axalimogene filolisbac (formerly ADXS-HPV), ADXS-PSA and ADXS-HER2.

As a result, Advaxis will resume all clinical trials with axalimogene filolisbac, ADXS-PSA and ADXS-HER2 immediately.

For those who are not familiar with the event, here is the brief review of the clinical hold.

In early October, Advaxis received verbal notice from the FDA that its Investigational New Drug (IND) application for axalimogene filolisbac (ADXS-HPV) had been placed on clinical hold, affecting four clinical trials.

The clinical hold, which pertained only to axalimogene filolisbac, was issued in response to a single event of one patient with end-stage cervical cancer who last received axalimogene filolisbac in early 2013 in an investigator-initiated trial. The patient passed away in mid-August 2015 after a series of treatments. The investigator ruled that the cause of death was due to progression of her cervical cancer. The company has evaluated this case and agrees with the investigator's conclusion that the cause of death was due to cervical cancer progression. The company believes that axalimogene filolisbac played no role in the patient's death.

At that time, ongoing clinical trials with Advaxis's other product candidates, ADXS-PSA and ADXS-HER2, were not affected by this hold and continued to actively enroll and dose patients.

In early November, the FDA verbally notified the Company that the clinical hold also included the INDs for ADXS-PSA and ADXS-HER2.

Since early October 2015, Advaxis had been in an ongoing dialogue with the FDA. Following discussions with the FDA and in accordance with their recommendations, the company agreed to **implement certain risk mitigation measures**, including revised study protocol inclusion / exclusion criteria, post-administration antibiotic treatment and patient surveillance and monitoring measures. Further, the FDA has concurred with the Investigator's assessment that the patient's cause of death was due to cervical cancer progression.

Expansion of Ongoing Phase II Began Dosing Patients

On March 07, 2016, ADXS announced dose administration for the first patient in the **expansion phase** of an ongoing **Phase II** clinical trial of axalimogene filolisbac (AXAL) in patients with persistent or recurrent metastatic (squamous or non-squamous cell) carcinoma of the cervix **(PRmCC).**

The interventional, open-label, non-randomized dose-escalation study is designed to evaluate the safety, efficacy and immunological effect of AXAL administered at doses up to 1 x 10^{10} colony forming units (CFU) in repeat cycles of treatment in approximately 25 women with cervical cancer whose disease recurred after receiving one prior cytotoxic treatment regimen.

The initiation of the expansion phase study follows positive preliminary data from 9 patients who showed that AXAL could be safely administered with prophylactic antibiotics up to 1 x10^{10} CFU, a tenfold increase from prior dosing regimens at 1 x 10^{9}. Adverse events at this high dose were consistent with previous

experience with predominately grade 1 or grade 2, transient events that self-resolved or were resolved with anti-inflammatory agents (NSAIDS) and antiemetics. The high dose expansion phase will include 15 patients.

The company plans to complete enrollment of the Phase II dose-escalation study in the first half of 2016.

We believe the high dose expansion study is an important step in AXAL's development program. A higher dose could increase the efficacy of the agent and increase the commercial opportunity in the future.

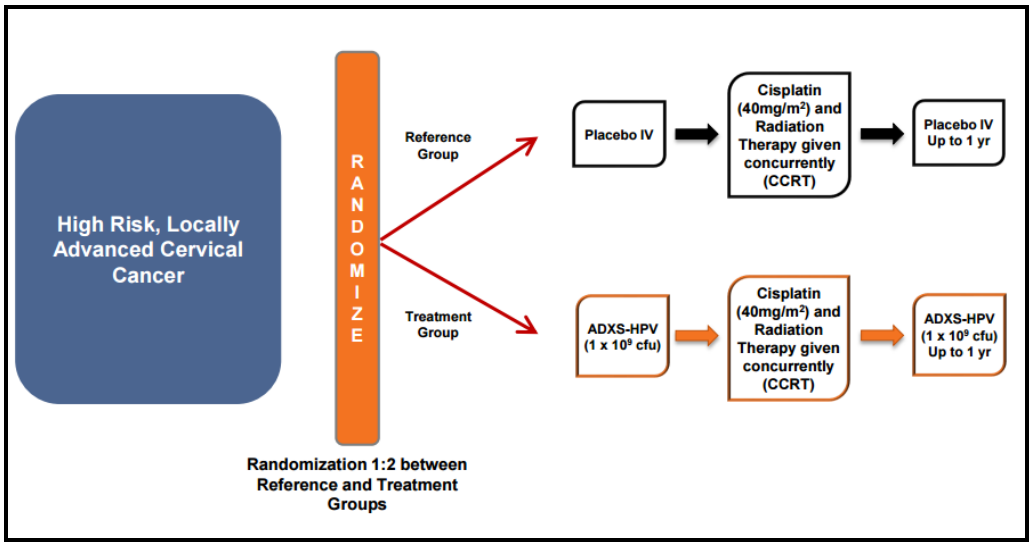
Update on Planned AXAL Phase III for Cervical Cancer

In June, 2015, ADXS submitted a Special Protocol Assessment **(SPA)** request to the FDA to initiate detailed design discussions for a Phase III clinical study of AXAL (ADXS-HPV) for the treatment of high-risk, locally advanced cervical cancer (HRLACC).

We believe the SPA request may facilitate a meaningful dialog with the FDA on the proposed **Phase III** study design. It's our belief that feedback from the FDA will help the appropriate design of the Phase III trial for locally advanced cervical cancer.

Advaxis plans to finish the SPA process and initiate enrollment in the Phase III trial in **mid-2016.**

The proposed Phase III clinical trial (**AIM2CERV**) will be a double-blind, placebo-controlled multinational study of ADXS-HPV administered in the adjuvant setting following concurrent chemoradiation given with curative intent in patients with HRLACC for whom recurrence has not yet occurred.



We believe the ADXS-HPV for cervical cancer is the company's key value driver in both the short term and long term as this is the most advanced clinical program in the company's pipeline. It will validate the company's key technology if the trial can demonstrate the efficacy and safety of the candidate. We look forward to the initiation of the Phase III trial and will update investors once we have details about the trial.

Update on GOG-0265 Phase II Trial of AXAL

GOG-0265 is an open-label, single-arm, two-stage **Phase II** study (NCT01266460) designed to evaluate the safety, tolerability and efficacy of axalimogene filolisbac (ADXS-HPV) in approximately 67 patients with Persistent or Recurrent Metastatic Cervical Cancer (**PRmCC**) who have received at least one prior line of systemic therapy. The primary efficacy endpoint is 12-month overall survival rate, with secondary efficacy endpoints of progression-free survival, overall survival and objective tumor response. The

primary safety endpoints are the number of patients with dose-limiting toxicities and the frequency and severity of adverse effects.

The trial is being conducted in the United States by GOG (now part of NRG Oncology) under the sponsorship of the Cancer Therapy Evaluation Program (CTEP) of the National Cancer Institute (NCI).

In September 2015, Advaxis announced positive data from Stage 1 of the ongoing two-stage Phase II study at the 2015 American Gynecological & Obstetrical Society (AGOS) annual meeting. The Stage 1 data showed that treatment with axalimogene filolisbac resulted in a **38.5%** 12-month overall survival rate in 26 patients.

ADXS-HPV was generally safe and well tolerated with 73% Grade 1or 2 adverse events.

Patients with PRmCC who have failed at least one line of therapy face a life threatening condition with an estimated survival of 4 to 7 months and no available treatment options. The 38.5% 12-month survival is a meaningful step forward in meeting the needs of women who require second-line treatment for PRmCC. The GOG has conducted over 17 studies of a diverse set of investigational agents and regimens, but never has the 12-month overall survival rate exceeded 30 percent in people with PRmCC.

The GOG is enrolling patients in **Stage 2** of the **Phase II** study. GOG has updated the dosing regimen for patients in Stage 2 of the study to extend treatment beyond three dosing cycles and to continue dosing ADXS-HPV at 1 x 10^9 cfu every 28 days until disease progression or the patient's medical condition prohibits further therapy.

Total of up to 38 patients are expected to be enrolled by June 30, 2016. Final study data (Stage 1 and 2) will be available in the **1H17**.

Phase I/II of AXAL in combination with MED14736 Initiated

In August 2015, Advaxis and MedImmune (part of AstraZeneca) began to enroll patients in a **Phase I/II** clinical trial of axalimogene filolisbac (ADXS-HPV) in combination with MedImmune's investigational anti-PD-L1 immune checkpoint inhibitor, **durvalumab** (MEDI4736), for the treatment of patients with advanced, recurrent or refractory HPV-associated **cervical cancer** and HPV-associated **head and neck cancer**.

The Phase I/II trial will be a two-part, open-label study designed to evaluate the safety and efficacy of axalimogene filolisbac as a monotherapy and in combination with durvalumab in approximately 66 patients. The Phase I portion is a dose-confirmation combination study with axalimogene filolisbac and durvalumab, which is expected to establish the maximum tolerated dose. The Phase II portion will randomize patients to receive axalimogene filolisbac monotherapy, durvalumab monotherapy, or the combination. The primary efficacy endpoints include objective response rate and progression-free survival.

The company plans to complete the enrollment in late 2016. Data from the Phase I/II will be available in the **first half of 2017**, which will determine the future clinical development program for the combination.

ADXS to Initiate Phase II Trial of AXAL in Combination with Epacadostat for the Treatment of Early Stage Cervical Cancer

In early June 2015, the FDA approved ADXS' IND application to conduct a Phase II trial of ADXS-HPV **alone or in combination** with Incyte Corporation's **epacadostat** (INCB24360) for the treatment of Stage I-IIIb HPV-associated **cervical cancer**.

The two companies entered into a non-exclusive clinical trial collaboration agreement in February 2015. The proposed **Phase II** trial is designed as a multicenter, open-label, preoperative window-study

designed to evaluate the safety and efficacy of ADXS-HPV as monotherapy and in combination with epacadostat in approximately **30 patients** with Stage I-IIIb HPV-associated cervical cancer. The results will be used to determine whether further clinical development of this combination is warranted.

Epacadostat is an investigational indoleamine 2,3-dioxygenase 1 (IDO1) inhibitor. IDO1 is an immunosuppressive enzyme that has been shown to induce regulatory T cell generation and activation, and allow tumors to escape immune surveillance. Epacadostat is an orally bioavailable small molecule inhibitor of IDO1 that has nanomolar potency in both biochemical and cellular assays, and has demonstrated potent activity in enhancing T lymphocyte, dendritic cell and natural killer cell responses in vitro, with a high degree of selectivity. Incyte has demonstrated proof-of-concept clinical data of epacadostat in patients with unresectable or metastatic melanoma in combination with the CTLA-4 inhibitor ipilimumab, and is currently in multiple proof-of-concept clinical trials with PD-1 and PD-L1 immune checkpoint inhibitors in a variety of cancer types.

The company plans to initiate the **Phase II** combination study in the first half of 2016.

We believe this program is a natural expansion of ADXS' franchise of HPV for cervical cancer.

Other Planned Clinical Trials for AXAL

- To commence enrollment of **Phase II** trial in metastatic anal cancer (FAWCETT) in the first half of 2016.
- To commence enrollment of **Phase II** study in patients with HPV-positive, non-squamous, non-small cell lung cancer following first-line induction chemotherapy via partner in the first half of 2016.
- To commence investigator initiated studies, including for other HPV-associated cancers (e.g., penile and vaginal cancers).

Update on ADXS-HER2 Program

Phase I ADXS-HER2 Initiated for Solid Tumors

In late September 2015, Advaxis initiated a **Phase Ib** dose-escalation clinical study of ADXS-HER2 for the treatment of patients with metastatic HER2 expressing solid tumors.

The dose escalation portion of the study will investigate the safety and tolerability of ADXS-HER2 as a monotherapy in approximately 18 patients diagnosed with metastatic HER2 expressing solid tumors, which include breast, gastric, esophageal and osteosarcoma. Once the maximum tolerated dose (MTD) and recommended Phase II dose have been identified, up to 80 patients may be enrolled in up to four HER2 expressing tumor specific cohorts in the **expansion phase** of the Phase Ib study.

ADXS expects to complete enrollment of this Phase Ib study of ADXS-HER2 in the **first half of 2016**. Once a dose is selected from Part A, enrollment in a Part B expansion phase will commence in the second half of 2016.

Following completion of Part A in the Phase Ib dose escalating study, the company will commence collaboration and cooperative group trial with the Children's Oncology Group in **osteosarcoma.**

Update on ADXS-PSA

ADXS plans to complete enrollment of **Phase I/II** study in combination with Merck's Keytruda® (pembrolizumab) for the treatment of advanced, metastatic castrate-resistant **prostate cancer**.

- Following the successful completion of dose escalation cohorts 1 and 2, which occurred in 2015, the company plans to fully enroll cohort 3 (highest dose at $1x10^{10}$) in the first half of 2016.

- Once a dose determination is made, enrollment in the Part B combination arm with ADXS-PSA and Keytruda® will commence in the first half of 2016, with completion of enrollment by the end of 2016.

Collaboration with Sorrento further Expands ADXS' Technology Application and Pipeline

The two companies entered into a non-exclusive research and clinical trial collaboration agreement in May 2015, which will evaluate the combination of ADXS' immunotherapy technology with Sorrento's antibody platform targeting immune checkpoints.

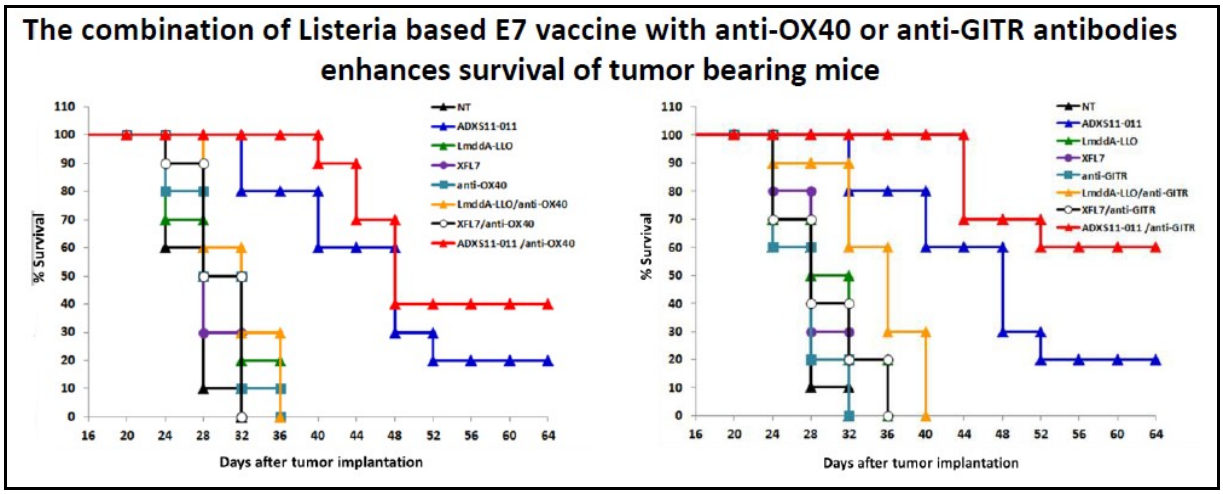
Under the terms of the agreement, Advaxis will conduct the studies and the companies will equally share the expenses. The two companies hope to commence the first of the two planned combination **studies in 2016.** Results from the studies will be used to determine whether further clinical development of specific combinations is warranted.

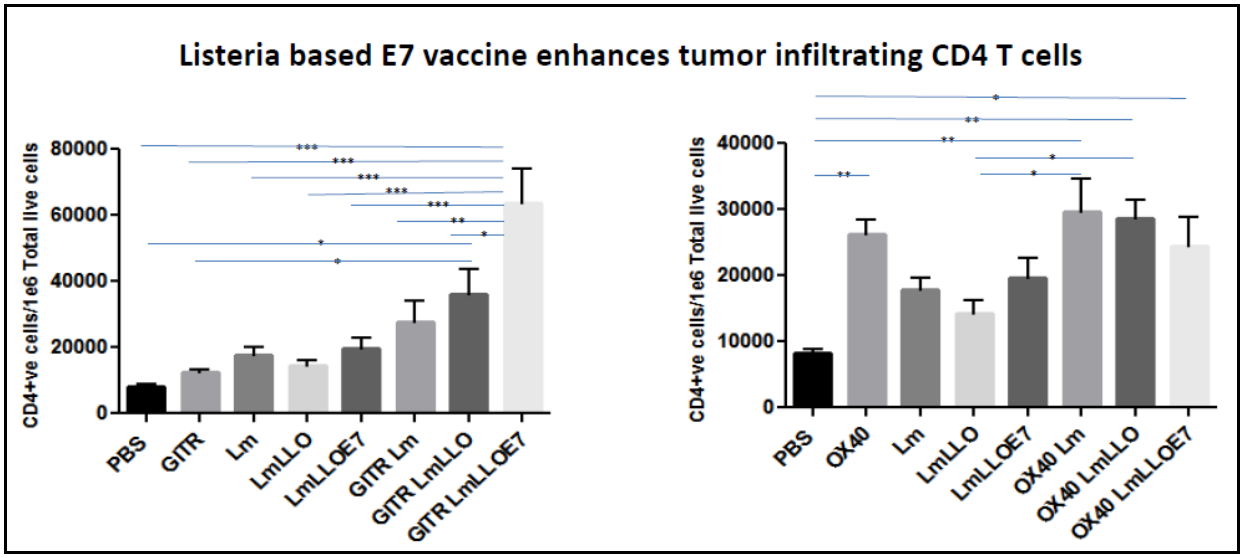
Sorrento has one of the largest and most diverse fully human antibody libraries in the industry designed to facilitate rapid identification and selection of highly specific therapeutic monoclonal antibody (mAb) product candidates.

In April 2015 at the AACR conference, ADXS presented preclinical data demonstrated that the combination of ADXS-HPV with agonistic research antibodies, including anti-OX40 and anti-GITR, led to significant inhibition of tumor growth and prolonged survival in tumor-bearing mice. Both OX40 and GITR are two types of immune checkpoints, like PD-1 and PDL-1, which play key roles in tumor development and growth.

The data demonstrated that the combination of ADXS-HPV with anti-OX40 or anti-GITR antibodies led to significant inhibition of tumor growth and prolonged survival in tumor bearing mice. Complete regression of established tumors occurred in 40% and 60% of animals treated with ADXS-HPV in combination with anti-OX40 or anti-GITR antibodies, respectively.

Both combination therapies significantly enhanced the number of tumor infiltrating CD4 T cells, which help to kill tumor cells.





We Remain Bullish On Advaxis Shares

We maintain our Buy rating for ADXS shares and our 12-month price target is $25 per share. Our call is based on the recent clinical achievements.

We are optimistic about Advaxis' live, attenuated Listeria technology, which is a unique immunotherapeutic platform that can target various cancer indications and infectious diseases. This technology has advantages over other immunotherapies and has generated positive clinical data. Combination of its technology with checkpoint inhibitors has the potential to become new standard of care for cancer treatment.

The recent deals are especially encouraging in our view. The deal with Aratana could get ADXS-cHER2 the first approved immunotherapy for animals in 2016. The deals with Biocon and GBP expand the usage of ADXS-HPV therapy for cervical cancer in the world two largest markets of cervical cancer in terms of patient population. The favorable terms in the deals not only strengthen Advaxis' balance sheet in a non-dilutive way, but also validate the Company's technology and clinical programs. Recent partnership with Knight Therapeutics further expands the global market of Advaxis' product portfolio.

The collaborations with Merck and MedImmune may lead to license deals. And the collaborations with Incyte and Sorrento further expand the company's pipeline and validate its key immunotherapy technology platform.

We look forward to the announcement of initiation of the pivotal Phase III trials of ADXS-HPV for recurring cervical cancer in mid-2016.

Advaxis has developed a robust pipeline based on its proprietary platform technology. In addition to cervical cancer, ADXS-HPV has potential to target other HPV-mediated cancers, such as head & neck cancer as well as anal cancer.

ADXS-HPV has a huge market potential. Cervical cancer is a worldwide problem and ranks as the 2nd leading cause of cancer death of women in the world. According to WHO, about 630 million people are infected with one of the over 100 strains of HPV. Global prevalence of clinically pre-malignant HPV infections is between 28 to 40 million women. Approximately 500,000 women are diagnosed of cervical cancer each year and about 11.4% of women in the general population are estimated to harbor cervical HPV infection. In the US, about 12000 new cases of cervical cancer are diagnosed each year. Prevalence of cervical cancer is higher in developing countries and India, China and South America are the three regions with highest cervical cancer prevalence (50% of cervical cancer burden).

The Company's balance sheet is strong. Current cash could last through 2017 according to our financial model.

In terms of valuation, we think Advaxis is undervalued at current market price. Currently, the Company shares are trading at about $8.5 per share which values the Company at about $289 million in market cap based on 34 million outstanding shares. This is still a discount compared to its peers.

We predict ADXS-HPV for cervical cancer to be approved in the US in late 2018 with 75% probability. Sales will reach $180 million in 2020 with earnings per share of $1.75. Using a relative valuation model, we come up with the fair value of $25.00 per share by using 35 x P/E multiple and discounted at 25% for 4 years.

Our price target of $25.00 per share values the Company at $850 million in market cap, which is still conservative in our view. Apparently, risk is still high for Advaxis at this stage. We will keep a close eye on clinical program advances.

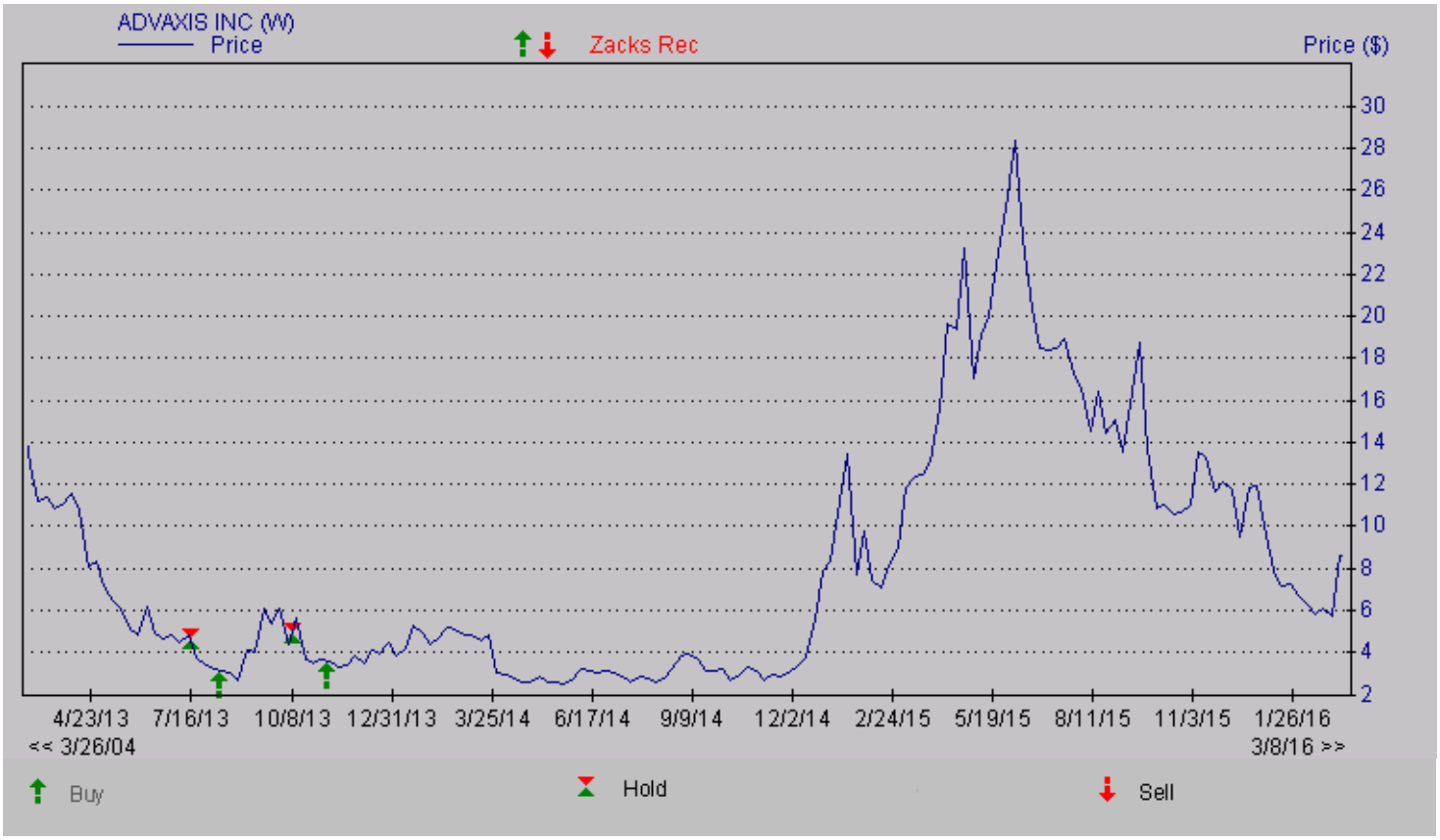
PROJECTED INCOME STATEMENT

	2015A (Oct)					2016E (Oct)					2017E (Oct)	2018E (Oct)	2019E (Oct)	2020E (Oct)
$ in million except per share data	Q1	Q2	Q3	Q4	FYA	Q1	Q2	Q3	Q4	FYE	FYE	FYE	FYE	FYE
Product Revenue	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$30.00	$85.00	$180.00
Licensing/R&D revenue	$0.00	$0.00	$0.00	$0.00	$0.00	$0.25	$0.25	$0.25	$0.25	$1.00	$1.00	$0.00	$0.00	$0.00
Total Revenues	**$0.00**	**$0.00**	**$0.00**	**$0.00**	**$0.00**	**$0.25**	**$0.25**	**$0.25**	**$0.25**	**$1.00**	**$1.00**	**$30.00**	**$85.00**	**$180.00**
YOY Growth	-	-	-	-	-	-	-	-	-	-	*100.0%*	*#DIV/0!*	*283.3%*	*211.8%*
CoGS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.50	12.75	27.00
Gross Income	**$0.00**	**$0.00**	**$0.00**	**$0.00**	**$0.00**	**$0.25**	**$0.25**	**$0.25**	**$0.25**	**$1.00**	**$1.00**	**$25.50**	**$72.25**	**$153.00**
Gross Margin	-	-	-	-	-	*100.0%*	*100.0%*	*100.0%*	*100.0%*	*100.0%*	*100.0%*	*85.0%*	*85.0%*	*85.0%*
R&D	$3.58	$6.14	$7.29	$7.22	$24.22	$13.06	$12.00	$13.50	$13.50	$52.06	$50.00	$35.00	$40.00	$42.00
% R&D	-	-	-	-	-	-				*5206.5%*	*5000.0%*	*116.7%*	*47.1%*	*23.3%*
SG&A	$3.20	$7.70	$6.34	$7.21	$24.45	$7.14	$7.20	$7.50	$7.80	$29.64	$32.00	$36.00	$38.00	$40.00
% SG&A	-	-	-	-	-	-	-	-	-	*2963.7%*	*3200.0%*	*120.0%*	*44.7%*	*22.2%*
Other	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
% Other	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Operating Income	**($6.8)**	**($13.8)**	**($13.6)**	**($14.4)**	**($48.7)**	**($20.0)**	**($19.0)**	**($20.8)**	**($21.1)**	**($80.7)**	**($81.0)**	**($45.5)**	**($5.8)**	**$71.0**
Operating Margin	-	-	-	-	-	-	-	-	-	-	-	*-151.7%*	*-6.8%*	*39.4%*
Other Net	($0.3)	($0.0)	$0.1	$0.2	$0.0	$0.1	$0.1	$0.1	$0.1	$0.4	($1.0)	($1.0)	($1.0)	($1.0)
Pre-Tax Income	**($7.0)**	**($13.9)**	**($13.6)**	**($14.2)**	**($48.6)**	**($19.8)**	**($18.9)**	**($20.7)**	**($21.0)**	**($80.3)**	**($82.0)**	**($46.5)**	**($6.8)**	**$70.0**
Income taxes(benefit)	$0.0	$0.0	$0.0	($1.6)	($1.6)	$0.0	$0.0	$0.0	$0.0	$0.0	$0.0	$0.0	$0.0	$0.00
Tax Rate	-	-	-	-	-	-	-	-	-	-	-	-	*0.0%*	*0.0%*
Reported Net Income	**($7.0)**	**($13.9)**	**($13.6)**	**($12.6)**	**($47.0)**	**($19.8)**	**($18.9)**	**($20.7)**	**($21.0)**	**($80.3)**	**($82.0)**	**($46.5)**	**($6.8)**	**$70.0**
YOY Growth	-	-	-	-	-	-	-	-	-	-	-	-	*-85.5%*	*-1137.0%*
Net Margin	-	-	-	-	-	-	-	-	-	-	-	-	*-7.9%*	*38.9%*
Shares Out	*21.6*	*26.7*	*31.0*	*32.9*	*28.0*	*33.7*	*33.8*	*34.0*	*34.5*	*34.0*	*33.0*	*35.0*	*37.0*	*40.0*
Reported EPS	**($0.33)**	**($0.52)**	**($0.44)**	**($0.38)**	**($1.68)**	**($0.59)**	**($0.56)**	**($0.61)**	**($0.61)**	**($2.36)**	**($2.48)**	**($1.33)**	**($0.18)**	**$1.75**
YOY Growth	-	-	-	-	-	-	-	-	-	-	-	-	-	-
One time charge	*$0.00*	*$0.00*	*$0.00*	*$1.61*	*$1.61*	*$0.00*	*$0.00*	*$0.00*	*$0.00*	*$0.00*	*$0.00*	*$0.00*	*$0.00*	*$0.00*
Non GAAP Net Income	**($7.0)**	**($13.9)**	**($13.6)**	**($11.0)**	**($45.4)**	**($19.8)**	**($18.9)**	**($20.7)**	**($21.0)**	**($80.3)**	**($82.0)**	**($46.5)**	**($6.8)**	**$70.0**
Non GAAP EPS	**($0.33)**	**($0.52)**	**($0.44)**	**($0.33)**	**($1.62)**	**($0.59)**	**($0.56)**	**($0.61)**	**($0.61)**	**($2.36)**	**($2.48)**	**($1.33)**	**($0.18)**	**$1.75**

Source: Company filing and Zacks Investment Research estimates

© Copyright 2016, Zacks Investment Research. All Rights Reserved.

HISTORICAL ZACKS RECOMMENDATIONS



DISCLOSURES

The following disclosures relate to relationships between Zacks Small-Cap Research ("Zacks SCR"), a division of Zacks Investment Research ("ZIR"), and the issuers covered by the Zacks SCR Analysts in the Small-Cap Universe.

ANALYST DISCLOSURES

I, Grant Zeng, hereby certify that the view expressed in this research report accurately reflect my personal views about the subject securities and issuers. I also certify that no part of my compensation was, is, or will be, directly or indirectly, related to the recommendations or views expressed in this research report. I believe the information used for the creation of this report has been obtained from sources I considered to be reliable, but I can neither guarantee nor represent the completeness or accuracy of the information herewith. Such information and the opinions expressed are subject to change without notice.

INVESMENT BANKING, REFERRALS, AND FEES FOR SERVICE

Zacks SCR does not provide nor has received compensation for investment banking services on the securities covered in this report. Zacks SCR does not expect to receive compensation for investment banking services on the Small-Cap Universe. Zacks SCR may seek to provide referrals for a fee to investment banks. Zacks & Co., a separate legal entity from ZIR, is, among others, one of these investment banks. Referrals may include securities and issuers noted in this report. Zacks & Co. may have paid referral fees to Zacks SCR related to some of the securities and issuers noted in this report. From time to time, Zacks SCR pays investment banks, including Zacks & Co., a referral fee for research coverage.

Zacks SCR has received compensation for non-investment banking services on the Small-Cap Universe, and expects to receive additional compensation for non-investment banking services on the Small-Cap Universe, paid by issuers of securities covered by Zacks SCR Analysts. Non-investment banking services include investor relations services and software, financial database analysis, advertising services, brokerage services, advisory services, investment research, investment management, non-deal road shows, and attendance fees for conferences

© Copyright 2016, Zacks Investment Research. All Rights Reserved.

sponsored or co-sponsored by Zacks SCR. The fees for these services vary on a per client basis and are subject to the number of services contracted. Fees typically range between ten thousand and fifty thousand per annum.

POLICY DISCLOSURES

Zacks SCR Analysts are restricted from holding or trading securities in the issuers which they cover. ZIR and Zacks SCR do not make a market in any security nor do they act as dealers in securities. Each Zacks SCR Analyst has full discretion on the rating and price target based on his or her own due diligence. Analysts are paid in part based on the overall profitability of Zacks SCR. Such profitability is derived from a variety of sources and includes payments received from issuers of securities covered by Zacks SCR for services described above. No part of analyst compensation was, is or will be, directly or indirectly, related to the specific recommendations or views expressed in any report or article.

ADDITIONAL INFORMATION

Additional information is available upon request. Zacks SCR reports are based on data obtained from sources we believe to be reliable, but are not guaranteed as to be accurate nor do we purport to be complete. Because of individual objectives, this report should not be construed as advice designed to meet the particular investment needs of any investor. Any opinions expressed by Zacks SCR Analysts are subject to change without notice. Reports are not to be construed as an offer or solicitation of an offer to buy or sell the securities herein mentioned.

ZACKS RATING & RECOMMENDATION

ZIR uses the following rating system for the 1052 companies whose securities it covers, including securities covered by Zacks SCR:
Buy/Outperform: The analyst expects that the subject company will outperform the broader U.S. equity market over the next one to two quarters.
Hold/Neutral: The analyst expects that the company will perform in line with the broader U.S. equity market over the next one to two quarters.
Sell/Underperform: The analyst expects the company will underperform the broader U.S. Equity market over the next one to two quarters.

The current distribution is as follows: Buy/Outperform- 16.6%, Hold/Neutral- 77.5%, Sell/Underperform – 5.3%. Data is as of midnight on the business day immediately prior to this publication.