

Aerie Pharmaceuticals

AERI : NASDAQ : US\$23.99

BUY**Target: US\$40.00**

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COMPANY STATISTICS:

| | |
|-------------------------|---------|
| Forecast Return: | 67% |
| 52-week Range: | 10 - 27 |
| Shares Out (M): | 23.7 |
| Market Cap (M): | 569 |
| Avg. Daily Vol. (000s): | 461 |
| Cash (M): | 65 |
| 2014E Burn: | (34) |
| 2015E Burn: | (47) |
| # Analysts: | 3 |
| Avg. Target: | 35 |
| # BUY: | 3 |
| Shares Short (M): | 0.4 |
| Days to Cover: | 2.4 |

EARNINGS SUMMARY:

| FYE Dec | 2013A | 2014E | 2015E | 2016E |
|----------|--------|---------|--------|--------|
| Revenue: | 0.0 | 0.0 | 0.0 | 0.0 |
| EPS: | | | | |
| Q1 | (0.22) | (0.20)A | - | - |
| Q2 | (0.26) | (0.25) | - | - |
| Q3 | (0.42) | (0.39) | - | - |
| Q4 | (0.54) | (0.37) | - | - |
| Total | (1.42) | (1.25) | (1.38) | (1.48) |

SHARE PRICE PERFORMANCE:



COMPANY DESCRIPTION:

AERI is a clinical-stage pharmaceutical company focused on the treatment of glaucoma (one of the largest segments in the global ophthalmic market) and other eye diseases. Its product candidates are the triple-action Rhopressa and quadruple-action Roclatan.

All amounts in US\$ unless otherwise noted.

Life Sciences – Specialty Pharmaceuticals

BROADENING VISION FOR GLAUCOMA MARKET

Investment recommendation

We are extremely bullish on both of Aerie's drugs for glaucoma. Now that both have successfully completed Phase 2, there should be a high chance for success in Phase 3. If ultimately approved, we think the combination of the two would have well over \$1B in peak potential. We are initiating coverage with a BUY rating and \$40 price target.

Investment highlights

- **Rhopressa** would be the first NCE for glaucoma in almost 20 years. It would be a once-daily eye drop that would compete directly with current drugs like Alphagan and Lumigan, but because it has three mechanisms of action in a single molecule, it has the potential to have a better effect on disease progression – it is the only glaucoma drug that improves function of the trabecular meshwork. It starts P3 soon and will finish year-end 2015. Interestingly, all 13 glaucoma drugs that successfully completed P2 also passed P3 and gained FDA approval. Hence P2s appear to be highly predictive. It would be positioned as first-line therapy in the 80% of glaucoma patients with IOP's < 26 mmHg.
- **Roclatan** is a combination of Rhopressa and the most widely used prostaglandin Xalatan (now generic as latanoprost). It just showed impressive P2 data June 25 – highest efficacy of any glaucoma drug – and will start P3 in Q2 2015. It would be positioned as the most efficacious glaucoma drug for those patients needing maximal IOP lowering, with IOPs >26 mmHg, and for those who already have optic nerve damage and vision loss.

Valuation/risks

Our one-year forward price target of \$40 target is derived by using a 20x multiple of our 2020 EPS estimate of \$6.89 and discounting back at 25% for 5.5 years. Risks include: failure of either Rhopressa or Roclatan in Phase 3 trials and/or failure to gain FDA on either drug.

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The recommendations and opinions expressed in this research report accurately reflect the Investment Analyst's personal, independent and objective views about any and all the Designated Investments and Relevant Issuers discussed herein. For important information, please see the Important Disclosures section in the appendix of this document.

INVESTMENT THESIS

Aerie has two drugs about to enter Phase 3 for glaucoma and we like the prospects of both, and what they could mean for the stock, for several reasons:

1. **Predictive Phase 2s.** Both have shown impressive Phase 2 data and in glaucoma, Phase 2 has been highly predictive of Phase 3. One interesting factoid is that all 13 glaucoma drugs that successfully completed Phase 2 also met with success in Phase 3 and were also eventually FDA approved. Hence we think Aerie has already significantly de-risked the story.
2. **Excellent efficacy – beat market leader in a head-to-head.** On June 25, Aerie released the Roclatan Phase 2 trial. It showed about an 8.5 mmHG drop in Intra-Ocular Pressure (IOP) at Day 29, which is one of the highest drops ever seen with a glaucoma drug. In addition, it beat the latanaprost-only arm by 1.6-3.2 mmHg – differences that were statistically significant at each time point. Latanoprost (now generic but was Pfizer's branded Xalatan) is the most widely used glaucoma drug and usually first-line therapy for patients.
3. **Long-lived assets.** Because Rhopressa is a New Chemical Entity (NCE) it will have a very long patent/exclusivity life. The same would apply to Roclatan because it is simply a combination of Rhopressa and Xalatan (now generic as Latanoprost).
4. **Unique mechanism of action.** Even though Rhopressa is a single molecule, it works on the three different systems that contribute to glaucoma and ultimately end up damaging the optic nerve. This creates the potential to slow the course of the disease (although it is highly unlikely to have any sort of "disease modification" in the label).
 - a. Decreases fluid inflow/production – ciliary processes
 - b. Increases fluid outflow – relaxes the trabecular meshwork
 - c. Increases fluid outflow –opening the secondary drain (uveoscleral pathway)
5. **Huge market.** Depending on which estimate one uses, the worldwide glaucoma market is somewhere between \$4.5B and \$6B. And with an aging population and expansion into emerging markets, these figures are growing about 2% a year.
6. **Limited competition.** Although there are plenty of glaucoma drugs on the market, there are fewer and fewer actively promoted products. And relative to other pharmaceutical markets, there are very few in development. The current major players are Allergan, Valeant, and Alcon.
7. **Multimodal therapy.** Most glaucoma patients will eventually need multiple therapies due to the progressive nature of the disease; hence the need for combination treatments allows new treatment like Rhopressa and Roclatan to break into the market more easily.
8. **Poor compliance.** It is well known that glaucoma patients are poorly compliant with their eye drops since most need twice-daily eye drops of multiple medications. Hence the once-daily dosing of both Aerie's products is attractive.
9. **Small sales force.** Because the market is fairly concentrated and only a handful of physicians do the bulk of prescribing, Aerie will not need a large sales force (and

hence low SG&A) to detail the products in the US if it chooses to. A sales force of 100-200 reps should be more than sufficient, in our view.

10. **Owns 100% of the rights.** Both products were invented by Aerie and hence are unencumbered by any royalties. That also leaves open the possibility for partnering in ex-US territories. This is one thing we always look for in a drug: inherently very high gross margins and because of the lower SG&A, very high operating margins, and by extension, tremendous EPS leverage because of the small share base.
11. **Plenty of cash.** At the end of March, Aerie had \$68M in cash on its balance sheet and it has stated that this would be sufficient to fund its operations until the middle of 2016. And although it does not look like Aerie NEEDS any cash for two years, we are never surprised when a company chooses to raise cash well before it needs to – especially after successful Phase 2 data like Roclatan just showed.

VALUATION -- \$40 PRICE TARGET

Because Aerie is unlikely to be profitable until 2018 at the earliest, we don't feel a DCF approach is warranted. Therefore as shown below, we simply use a discounted multiple approach. For fast-growing companies with new products with long life cycles, we think a 20x multiple off forward year earnings is appropriate. And we usually like to use a 25% discount rate on products not yet having completed Phase 3. Therefore, applying 20x to our 2020 EPS estimate and discounting it back 5.5 years (for a 12-month target) yields our \$40 price target. Because there are those who may disagree with our choice of multiples, years of earnings, and choice of discount rate, we present the sensitivity analysis in the two tables below.

Figure 1: Price target sensitivity analysis by year of EPS estimates

| | 2018 | 2019 | 2020 | 2021 | 2022 |
|----------------|---------|---------|-------------|---------|---------|
| PE multiple | 20.0x | 20.0x | 20.0x | 20.0x | 20.0x |
| EPS | \$1.11 | \$3.87 | \$6.89 | \$7.21 | \$7.41 |
| Total | 22.13 | 77.40 | 137.77 | 144.29 | 148.20 |
| Discount Rate | 25% | 25% | 25% | 25% | 25% |
| Discount Years | 3.5 | 4.5 | 5.5 | 6.5 | 7.5 |
| Price Target | \$10 | \$28 | \$40 | \$34 | \$28 |
| Current price: | \$24.93 | \$24.93 | \$24.93 | \$24.93 | \$24.93 |
| Return | (59.4%) | 13.7% | 61.9% | 35.7% | 11.5% |

Source: Canaccord Genuity estimates

Figure 2: Price target sensitivity analysis by multiple and discount rate

| 2020 EPS: \$6.89 | | Multiple | | | | | |
|----------------------|-------|----------|-------|-------------|-------|-------|-------|
| Discount Period: 5.5 | | 10.0x | 15.0x | 20.0x | 25.0x | 30.0x | 35.0x |
| Discount Rate | 10.0% | \$41 | \$61 | \$82 | \$102 | \$122 | \$143 |
| | 15.0% | \$32 | \$48 | \$64 | \$80 | \$96 | \$112 |
| | 20.0% | \$25 | \$38 | \$51 | \$63 | \$76 | \$88 |
| | 25.0% | \$20 | \$30 | \$40 | \$50 | \$61 | \$71 |
| | 30.0% | \$16 | \$24 | \$33 | \$41 | \$49 | \$57 |
| | 35.0% | \$13 | \$20 | \$26 | \$33 | \$40 | \$46 |
| | 40.0% | \$11 | \$16 | \$22 | \$27 | \$32 | \$38 |

Source: Canaccord Genuity estimates

REVENUE & MARKET MODELS

Our model is built on the assumption that Rhopressa will launch in the US in the second half of 2017, followed about a year later by Roclatan. A summary of our revenue estimates is shown in the table below. And the market model that we use to derive these revenue forecasts is shown in the figure two below. It is based on IMS prescription data for the existing glaucoma drugs. Note that we have the combination of both drugs hitting \$1 billion in revenue in 2022 and this equates to roughly a 22% combined share of the total glaucoma market at that time. Also note that we have used pricing assumptions that are in line with current branded drugs like Lumigan, Alphagan, and Travatan Z -- \$110 per month for Rhopressa and a slight premium of \$135/month for Roclatan. We think the efficacy seen in Phase 2, if replicated in Phase 3, along with the novel mechanism of action and the potential for “disease modification” will justify this level of pricing. However, given how highly genericized this market is, there could be significant push-back from managed care in the absence of obvious efficacy advantages.

Figure 3: Revenue estimates

| | Rhopressa | Roclatan | Other | TOTAL REVENUE |
|--------------|-----------|----------|-------|------------------|
| 2017E | 25.5 | | | 25.5 |
| 2018E | 135.1 | 31.9 | | 167.0 |
| 2019E | 243.6 | 126.8 | | 370.4 |
| 2020E | 349.6 | 269.1 | | 618.6 |
| 2021E | 455.5 | 356.8 | | 812.3 |
| 2022E | 521.7 | 494.5 | | 1,016.2 |

Source: Canaccord Genuity estimates

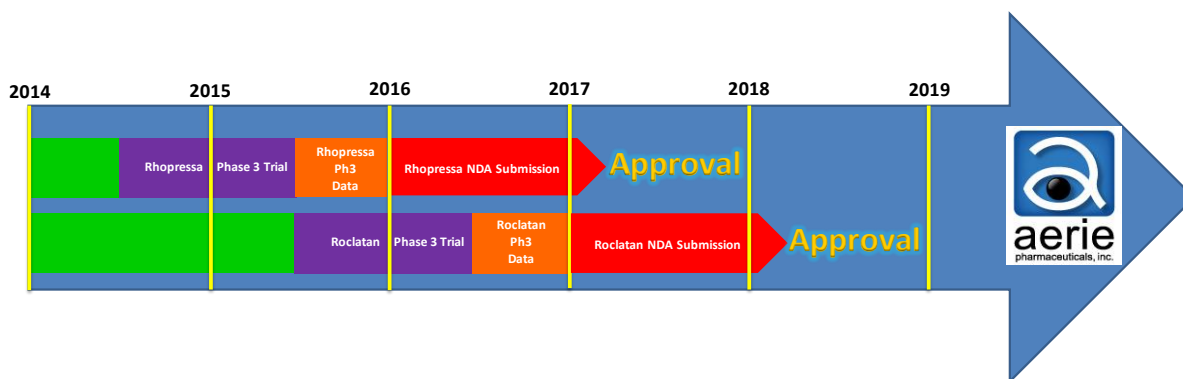
Figure 4: Glaucoma market model

| GLAUCOMA MARKET | | | | | | | | | | | | | |
|-------------------------------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|
| | 2014E | 2015E | 2016E | 2017E | 2018E | 2019E | 2020E | 2021E | 2022E | 2023E | 2024E | 2025E | 2026E |
| All Glaucoma Rxs (000) | 27,269,816 | 27,815,212 | 28,371,516 | 28,938,946 | 29,517,725 | 30,108,080 | 30,710,242 | 31,324,446 | 31,950,935 | 32,589,954 | 33,241,753 | 33,906,588 | 34,584,720 |
| % growth | 4.5% | 4.0% | 4.0% | 3.0% | 2.0% | 2.0% | 2.0% | 2.0% | 2.0% | 2.0% | 2.0% | 2.0% | 2.0% |
| Glaucoma Market Shares | | | | | | | | | | | | | |
| Latanoprost | 40.1% | 40.4% | 40.8% | 42.3% | 41.7% | 40.7% | 39.3% | 39.7% | 40.5% | 41.5% | 41.7% | 40.7% | 41.5% |
| Lumigan | 12.2% | 12.3% | 12.4% | 12.4% | 12.0% | 11.0% | 10.0% | 9.0% | 8.0% | 7.0% | 6.0% | 5.0% | 4.0% |
| Travaten/Travoprost | 10.5% | 10.2% | 10.0% | 9.0% | 8.0% | 7.0% | 6.0% | 5.0% | 4.0% | 3.0% | 2.0% | 2.0% | 2.0% |
| Zioptan | 0.6% | 0.8% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% | 1.0% |
| Beta-blockers (BB) | 9.3% | 9.0% | 8.5% | 8.0% | 7.5% | 7.0% | 6.5% | 6.0% | 5.5% | 5.0% | 4.5% | 4.0% | 3.5% |
| Beta-blocker Fixed Combinations | 7.3% | 7.0% | 7.0% | 6.5% | 6.0% | 5.5% | 5.0% | 4.5% | 4.0% | 3.5% | 3.0% | 2.5% | 2.0% |
| Alpha agonists (AA) | 12.0% | 12.0% | 12.0% | 11.0% | 10.5% | 10.0% | 9.5% | 9.0% | 8.5% | 8.0% | 7.5% | 7.0% | 6.5% |
| Carbonic Anhydrase Inhibitors (CAI) | 10.0% | 10.0% | 10.0% | 9.0% | 8.5% | 8.0% | 7.5% | 7.0% | 6.5% | 6.0% | 5.5% | 5.0% | 4.5% |
| Rhopressa Share | | | | 0.8% | 4.0% | 6.8% | 9.2% | 11.3% | 12.2% | 13.0% | 13.8% | 14.8% | 15.0% |
| Rhopressa TRx Volume | | | | 231,512 | 1,180,709 | 2,047,349 | 2,825,342 | 3,539,662 | 3,898,014 | 4,236,694 | 4,587,362 | 5,018,175 | 5,187,708 |
| \$ / Rx | | | | \$110 | \$114 | \$119 | \$124 | \$129 | \$134 | \$139 | \$145 | \$151 | \$157 |
| Rhopressa revenue (\$M) | | | | \$25 | \$135 | \$244 | \$350 | \$455 | \$522 | \$590 | \$664 | \$755 | \$812 |
| Roclatan Share | | | | 0.8% | 3.0% | 6.0% | 7.5% | 9.8% | 12.0% | 15.0% | 18.0% | 20.0% | 20.0% |
| Roclatan TRx Volume | | | | 236,142 | 903,242 | 1,842,614 | 2,349,333 | 3,131,192 | 3,910,794 | 4,986,263 | 6,103,186 | 6,916,944 | 6,916,944 |
| \$ / Rx | | | | \$135 | \$140 | \$146 | \$152 | \$158 | \$164 | \$171 | \$178 | \$185 | \$185 |
| Roclatan revenue (\$M) | | | | \$32 | \$127 | \$269 | \$357 | \$495 | \$642 | \$852 | \$1,084 | \$1,278 | \$1,278 |
| TOTAL AERIE REVENUE | | | | \$25 | \$167 | \$370 | \$619 | \$812 | \$1,016 | \$1,232 | \$1,516 | \$1,840 | \$2,090 |
| % growth | | | | | 556% | 122% | 67% | 31% | 25% | 21% | 23% | 21% | 14% |

Source: Canaccord Genuity estimates; IMS

TIMELINES FOR AERIE

Figure 5: Rhopressa should be launched in 2017 and Roclatan in 2018



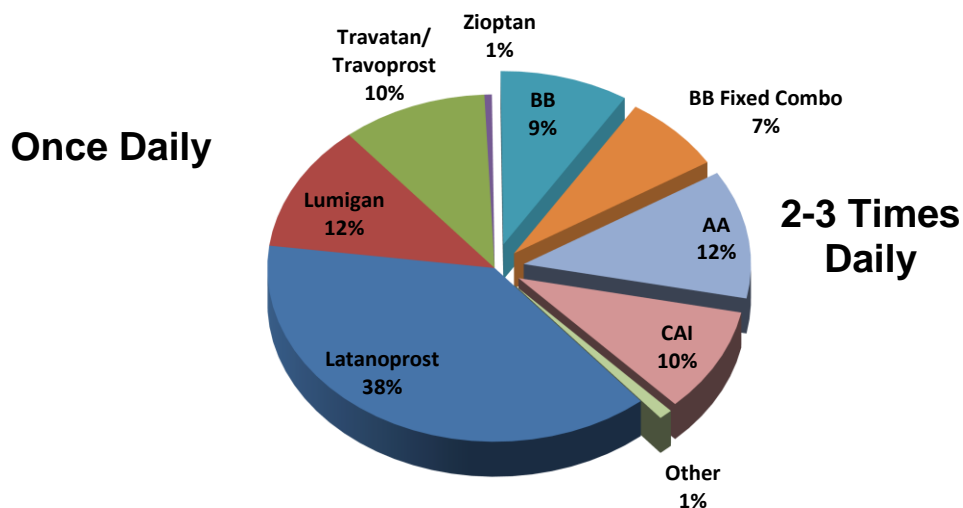
Source: Company Disclosures

CURRENT US MARKET IS ~\$2B BUT MOSTLY GENERIC

There are currently four classes of glaucoma treatments (five if you count the combination treatments). The goal of all the therapies is to reduce the fluid pressure inside the eye that leads to damage to the optic nerve and ultimately in blindness. Most importantly, none of these works on the trabecular meshwork, where Rhopressa functions (in addition to the other two mechanisms). All are eye drops and most of the market is mostly genericized:

1. **Prostaglandin analogues** – like Lumigan, Travatan, Xalatan (latanoprost). All of these are once-daily. Combined these have about 61% market share. They function by increasing the outflow of fluid from the eye.
2. **Beta blockers** – like timolol, have 9% share. They function by decreasing the fluid production in the eye.
3. **Alpha blockers** – Like Allergan's Alphagan that has 12% share. It functions both by decreasing fluid production and increases drainage to the eye.
4. **Carbonic anhydrase inhibitors (CAIs)** – like Trusopt and Azopt, have 10% share. They function by decreasing the production of intraocular fluid.
5. One could add a fifth category for the beta-blocker combination products like Allergan's Combigan (Alphagan plus timolol) and Merck's old Cosopt (timolol plus Trusopt) but since these are not a discreet class of molecule, we still consider there to be only four classes of glaucoma drugs as defined by molecule type. The combination products hold 7% share.

Figure 6: There are five major classes of current glaucoma treatments



Source: IMS

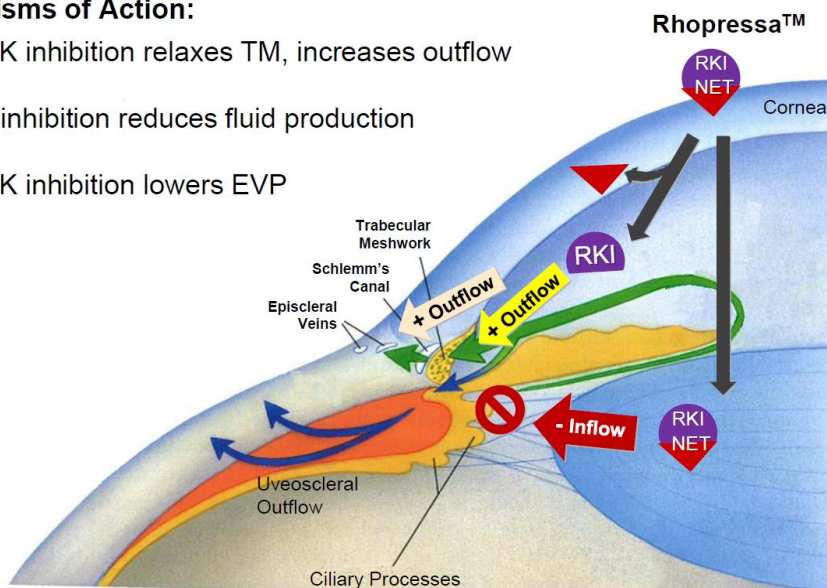
RHOPRESSA MECHANISM, PHASE 2 DATA, PHASE 3 DESIGN

As shown in the figure below, Rhopressa has a triple mechanism of action and most importantly works on areas where currently therapies do not; hence, it has the potential to alter the course of the disease.

Figure 7: Triple-action Rhopressa

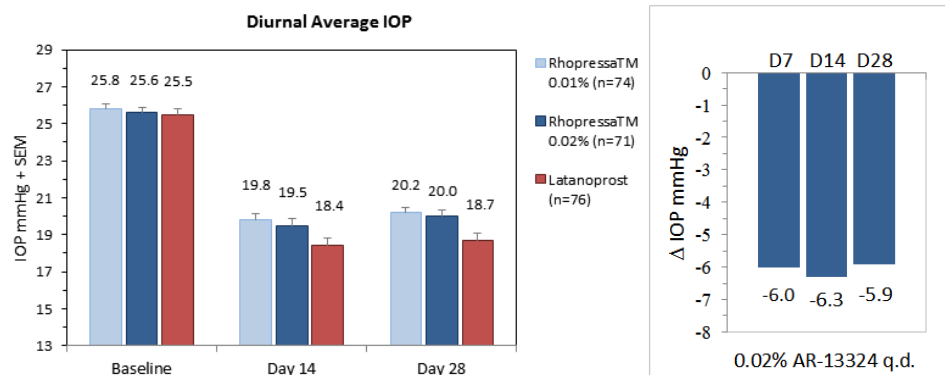
Mechanisms of Action:

1. ROCK inhibition relaxes TM, increases outflow
2. NET inhibition reduces fluid production
3. ROCK inhibition lowers EVP



Source: Company presentation

Figure 8: Rhopressa demonstrated strong IOP lowering in Phase 2b



Source: Company filings

FUTURE CLINICAL DEVELOPMENT OF RHOPRESSA: PHASE 3

The Rhopressa Phase 3 will begin in July 2014 and we'd expect results in the middle of 2015. Then, with a late 2015 filing anticipated, we are modeling a launch in 2017. It will be a non-inferiority design versus timolol (because it would be unethical to put glaucoma patients on placebo). The primary efficacy endpoint will be taken at 90 days. Importantly, Aerie is only going to enroll the less severe patients (but the bulk of the population with IOP's between 20 and 27 mmHg. A summary of the Phase 3 program is shown in the figure below.

Figure 9: Rhopressa Phase 3 Program

"Rocket 1" 90-Day Efficacy Registration Trial:

| | |
|---------------------|---------------|
| Rhopressa™ 0.02% QD | ~200 patients |
| Timolol BID | ~200 patients |

"Rocket 2" One Year Safety (3 mo. interim efficacy) Registration Trial:

| | |
|-----------------------------------|---------------|
| Rhopressa™ 0.02% QD | ~230 patients |
| Rhopressa™ 0.02% BID ¹ | ~230 patients |
| Timolol BID | ~230 patients |

¹ PGAs have been shown to be less effective when dosed BID

"Rocket 3" One Year Safety-Only Study – Canada:

| | |
|----------------------|--------------|
| Rhopressa™ 0.02% QD | ~90 patients |
| Rhopressa™ 0.02% BID | ~90 patients |
| Timolol BID | ~60 patients |

Source: Company Presentation

ROCLATAN MECHANISM AND PHASE 2 DATA

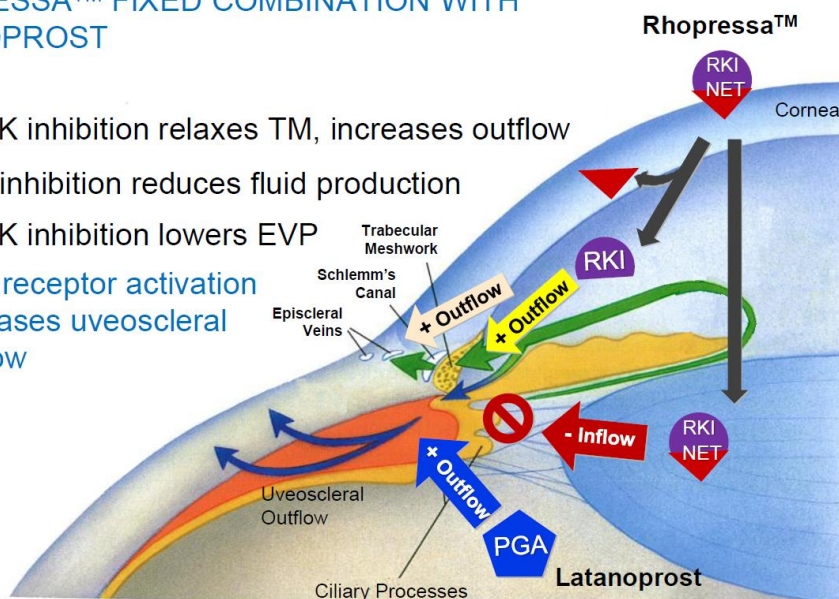
Roclatan is simply a combination of Rhopressa with the most widely prescribed prostaglandin, latanoprost. The mechanism is shown in the figure below.

Figure 10: Roclatan combines Rhopressa and latanoprost

RHOPRESSA™ FIXED COMBINATION WITH LATANOPROST

MOAs:

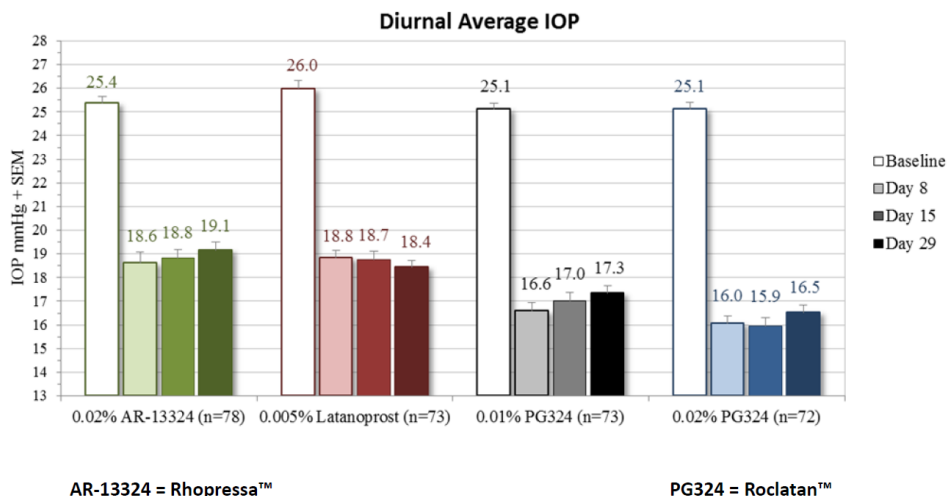
1. ROCK inhibition relaxes TM, increases outflow
2. NET inhibition reduces fluid production
3. ROCK inhibition lowers EVP
4. PGA receptor activation increases uveoscleral outflow



Source: Company Presentation

On July 25, the company announced very impressive Phase 2b data on Roclatan, and after finishing up more preclinical work that the FDA has asked for, the Phase 3 trial should start in mid-2015. Most importantly, Roclatan was statistically superior to each of the individual components and showed a 1.6-3.2 mmHg higher IOP lowering than latanoprostalone – an effect that we feel is not only statistically significant, but clinically relevant. The same held true for the comparisons to Rhopressa where there was a 1.7-3.4 mmHg greater improvement for Roclatan. A summary of the Phase 2 data is shown below:

Figure 11: Roclatan's impressive Phase 2b data showed a statistical advantage over each of the individual components



Source: Company Presentation July 25, 2014

COMPETITION

Figure 12: Competitive drugs in development

Rhopressa™ is the only new MOA product dosed once-daily

| New MOAs | | |
|----------------------|-----------------------------|-----------------|
| AR-13324 (Aerie) | ROCK/NET inhibitor (qd) | Phase 2b |
| K-115 (Kowa) | ROCK inhibitor (bid) | Phase 3 (Japan) |
| AMA0076 (Amakem) | ROCK inhibitor (bid) | Phase 2a |
| INO-8875 (Inotek) | Adenosine-A1 agonist (bid) | Phase 2 |
| OPA-6566 (Acucela) | Adenosine-A2a agonist (bid) | Phase 1/2 |
| SYL040012 (Sylentis) | RNAi beta blocker (bid) | Phase 2 |

New PGAs - not usable as add-on to current PGAs

| New PGAs | | |
|------------------|------------------------------|----------|
| BOL-303259 (B+L) | NO donating latanoprost (qd) | Phase 3 |
| DE-117 (Santen) | EP2 agonist (qd) | Phase 2a |
| ONO-9054 (Ono) | FP/EP3 agonist (qd) | Phase 1 |

Source: Company presentation

INTELLECTUAL PROPERTY

Aerie's two drugs are covered by several patents lasting through at least 2030. There are also several patents pending and all patents are both composition-of-matter and use patents. Four of the key issued patents are listed below.

Figure 13: Key Rhopressa patents

| Patent # | Name | IP Covered | Status | Expiration Date |
|-----------|--|--|--------|-----------------|
| 8,450,344 | Beta- and gamma-amino-isoquinoline amide compounds and substituted benzamide compounds | Compounds that affect the function of kinases in a cell that are useful as therapeutic agents or with therapeutic agents | Issued | 2026 |
| 8,394,826 | Dual mechanism inhibitors for the treatment of disease | Compounds that are inhibitors of both rho kinase and of monoamine transporter (MAT) that act to improve the disease | Issued | 2030 |
| 8,455,513 | 6-aminoisoquinoline compounds | 6-Amino isoquinoline compounds that influence, inhibit or reduce the action of a kinase | Issued | 2027 |
| 8,455,514 | 6- and 7-aminoisoquinoline compounds and methods for making and using the same | 6- and 7-aminoisoquinoline compounds that influence, inhibit or reduce the action of a kinase | Issued | 2028 |

Source: Company reports and Canaccord Genuity estimates

MANAGEMENT TEAM

The Aerie management team has a strong history of research, development and commercialization in the Biotechnology space.

Vicente Anido, Jr., Ph.D., Aerie's chief executive officer since July 2013, joined Aerie in April 2013 as a chairman and member of the company's Board of Directors. Before Aerie, Dr. Anido served as president, chief executive officer and director of ISTA Pharmaceuticals, which was acquired by Bausch + Lomb in 2012. Prior to his work at ISTA Pharmaceuticals, Dr. Anido served as general partner of Windamere Venture Partners. Before his work at Windamere Venture Partners, he served as president and chief executive officer of a drug discovery company called CombiChem Inc. From 1993 to 1996, Dr. Anido was the president of the Americas Region of Allergan, and was responsible for Allergan's commercial operations in North and South America. Before serving as president of Allergan, Dr. Anido worked at Marion Laboratories and Marion Merrell Dow for 17 years, where he held positions including vice president-business management of the company's Prescription Products Division. Dr. Anido currently serves as a member of the Board of Directors of QLT and Depomed. He previously served as a member of the Board of Directors of Apria Healthcare. He received his BS and MS from West Virginia University and a PhD from the University of Missouri, Kansas City.

Casey C. Kopczynski, Ph.D., co-founded Aerie in 2005 and has since served as the company's chief scientific officer. Before cofounding Aerie, he was the managing partner at Biotech Initiative, LLC, a consulting practice for emerging biotech companies. Before his work at Biotech Initiative, Dr. Kopczynski was the vice president of research at Ercole Biotech, a company developing drugs for the treatment of cancer, inflammation, and orphan genetic diseases. Before his work at Ercole Biotech, he was director of research and a founding member of the scientific staff at Exelixis. Dr. Kopczynski received his Ph.D. in molecular, cellular, and developmental biology from Indiana University and was a Jane Coffin Childs Research Fellow at the University of California, Berkeley.

Brian Levy, O.D., M.Sc. joined Aerie in January 2012 as chief medical officer. Before joining Aerie, Dr. Levy was the chief scientific officer of Nexis Vision, a small venture-backed company developing products in ophthalmology. Before Nexis Vision, Dr. Levy served as chief operating officer of Danube Pharmaceuticals. Prior to his work at Danube Pharmaceuticals, Dr. Levy worked at Bausch + Lomb, serving in various roles including vice president of research & development, corporate vice president of research & development, and chief medical officer. Before Bausch + Lomb, Dr. Levy worked in a private clinical practice in Toronto, Ontario, after which time he served as an associate professor in the Department of Ophthalmology at California Pacific Medical Center in San Francisco. He currently holds an appointment as clinical professor in the Department of Ophthalmology at the University of Rochester's School of Medicine. Dr. Levy received his doctor of optometry degree from the University of California at Berkeley and received his MS from the University of Waterloo in Ontario, Canada.

Thomas A. Mitro, president and chief operating officer of Aerie, joined the company in August 2013. Prior to joining Aerie, Mr. Mitro served as vice president, sales and marketing at Omeros Corporation, a publicly traded clinical-stage biopharmaceutical company. Before Omeros, Mr. Mitro served as vice president, sales and marketing at ISTA Pharmaceuticals, where he played a key role in building commercial operations for products including Bromday and Bepreve. Earlier in his career, Mr. Mitro served in various positions at Allergan, including vice president, skin care; vice president, business development; and vice president, e-business. He received his B.S. degree from Miami University.

Richard J. Rubino, Aerie's chief financial officer, joined the company in October 2012. Before joining Aerie, Mr. Rubino served as senior vice president, finance and chief financial officer of Medco Health Solutions. Earlier roles at Medco include controller and vice president of planning for the company. Prior to his work at Medco, Mr. Rubino held various positions at International Business Machines Corporation and PricewaterhouseCoopers LLP. He is a Certified Public Accountant and member of the American Institute of Certified Public Accountants. He received his B.S. in accounting from Manhattan College. Mr. Rubino currently serves as a director and the treasurer of the Northside Center for Child Development in addition to serving as a member of the organization's Finance Committee.

Figure 14: Aerie key management members

| Name | Title | Industry experience prior to Aerie | Joined Aerie in: |
|----------------------------|--------------------------|---|------------------|
| Vicente Anido, Jr., Ph.D. | Chief Executive Officer | ISTA Pharmaceuticals, Inc. Windamere Venture Partners ComiChem, Inc. Allergan, Inc. Marion Laboratories and Marion Merrell Dow Inc. | 2013 |
| Casey C. Kopczynski, Ph.D. | Chief Scientific Officer | Biotech Initiative, LLC Ercol Biotech, Inc. Exelixis, Inc. | 2005 |
| Brian Levy, O.D., M.Sc. | Chief Medical Officer | Bausch ' + Lomb, Inc. Danube Pharmaceuticals Nexis Vision | 2012 |
| Thomas A. Mitro | President and COO | Omeros Corporation ISTA Pharmaceuticals, Inc. Allergan, Inc. | 2013 |
| Richard J. Rubino | Chief Financial Officer | Medco Health Solutions, Inc. International Business Machines Corporation Pricewaterhouse Coopers LLP | 2012 |

Source: Company reports

INVESTMENT RISKS

Clinical risk – Rhopressa's and Roclatan's Phase 3 programs may not be successful. While we believe there is strong positive precedent data for both from each of the respective Phase 2 studies, there is always a chance of failure in Phase 3. The Phase 2 trials only measured efficacy and safety at one month, but the Phase 3s will go out to three months for efficacy and one year for safety. In addition, a previous AERI drug candidate showed roll-off of effect between month 1 and 3. However, we believe this older drug was more highly specific to ROCK inhibition than Rhopressa, which has low-level PKC inhibition activity as well. The PKC pathway may compensate for ROCK-mediated IOP lowering; therefore inhibiting both should result in sustained benefit. Given almost no systemic exposure with Rhopressa and Roclatan as eye drops, we expect continued clean safety, even with longer treatment duration in the upcoming Phase 3 trials versus the Phase 2.

Regulatory risk – FDA may not approve Rhopressa or Roclatan, as the agency is inherently unpredictable – even if the Phase 3 trials look successful on the surface. Should the FDA's interpretation of the relationship between IOP lowering and loss of visual acuity change, the agency may want additional measures of benefit to grant approval. We deem this highly unlikely given there have been many glaucoma drugs approved under the current and planned paradigm. Further, clinical trials could yield some new safety signal that could be of concern to the agency.

Competitive risk – There are a number of other current, well-established classes of glaucoma therapy on the market that clinicians have significant experience with; a number of other approved glaucoma drugs utilize different mechanisms to treat the disease. All of these drugs have been approved for years, if not decades; ophthalmologists have had significant experience treating patients with these medications, and have significant comfort with their efficacy and side effect profiles. As a result, ophthalmologists may continue to preferentially prescribe these drugs despite any potentially superior therapeutic profile of Rhopressa or Roclatan.

Commercialization/reimbursement risk – As we mentioned previously, most current glaucoma therapies are generics, and are available relatively cheaply compared to AERI's intended pricing for Rhopressa (\$110/month is our assumption) and Roclatan (\$135/month is our assumption); therefore, there is no guarantee AERI will be able to secure reimbursement for these drugs. Most (but not all) glaucoma medications are available in generic form in the US for <\$30 per month. Branded glaucoma drugs like Lumigan and Alphagan are still able to secure reimbursement and meaningful market share, although many are restricted to second-line use with step-edits. Whether this ends up also being the case with Aerie will depend on the strength of the efficacy data – and whether Aerie is able to show evidence of disease modification.

Financial risk – AERI's current cash position will last until mid-2016. While not really a risk per se, we have assumed two additional capital raises in our model – one in Q4 2014 and one in 2017 prior to the launch of Rhopressa. We do not factor in any upfront payments from potential partnerships from ex-US markets. And an inability to raise enough capital to extend operations until profitability would present a risk.

3 July 2014

Figure 15: AERI P&L

| Year End: December 31 | 2012 | 2013 | 1Q14 | 2Q14E | 3Q14E | 4Q14E | 2014E | 2015E | 2016E | 2017E | 2018E | 2019E | 2020E | 2021E | 2022E |
|-------------------------------|---------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|----------------|----------------|----------------|----------------|------------------|
| Rhopressa | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$25.7 | \$136.1 | \$245.5 | \$352.3 | \$459.1 | \$525.8 |
| Roclatan | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$32.1 | \$127.8 | \$271.2 | \$359.6 | \$498.4 |
| Total Revenue | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$25.7 | \$168.3 | \$373.3 | \$623.5 | \$818.6 | \$1,024.1 |
| Gross Profit | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$0.0 | \$23.1 | \$151.4 | \$336.0 | \$561.1 | \$736.8 | \$921.7 |
| Gross Margin | | | | | | | | | | 90.0% | 90.0% | 90.0% | 90.0% | 90.0% | 90.0% |
| SG&A | \$5.0 | \$9.9 | \$3.6 | \$4.0 | \$4.0 | \$4.5 | \$16.1 | \$16.0 | \$17.0 | \$50.0 | \$65.0 | \$74.8 | \$86.0 | \$90.3 | \$94.8 |
| R&D | 9.3 | 12.3 | 5.4 | 7.0 | 9.0 | 10.0 | 31.4 | 40.0 | 45.0 | 47.3 | 49.6 | 52.1 | 54.7 | 52.0 | 49.4 |
| Adj. Operating Income | (14.3) | (32.2) | (9.0) | (7.8) | (13.0) | (14.5) | (44.3) | (56.0) | (62.0) | (74.2) | 29.5 | 140.2 | 263.6 | 370.9 | 466.9 |
| Adj. Operating Margin | | | | | | | | | | | 17.5% | 37.6% | 42.3% | 45.3% | 45.6% |
| Non-Op | (0.7) | (8.6) | 2.3 | 0.0 | 0.0 | 0.0 | 2.3 | 1.0 | 1.0 | 1.0 | 1.0 | 1.0 | 1.0 | 1.0 | 1.0 |
| Tax Rate | | | | | | | | | 0.0% | 0.0% | 0.0% | 0.0% | 0.0% | 25.0% | 38.0% |
| Adj. Net Income | (15.3) | (27.8) | (4.8) | (5.9) | (11.1) | (12.6) | (34.4) | (47.0) | (51.0) | (61.2) | 44.5 | 157.2 | 282.6 | 298.9 | 310.1 |
| Net Margin | 0% | 0.0% | 0% | | | | | | | | 26.4% | 42.1% | 45.3% | 36.5% | 30.3% |
| GAAP EPS (diluted) | \$0.00 | (\$1.23) | (\$0.28) | (\$0.33) | (\$0.45) | (\$0.43) | (\$1.53) | (\$1.61) | (\$1.22) | (\$1.07) | \$0.74 | \$3.48 | \$6.45 | \$6.73 | \$6.93 |
| Adjusted EPS (diluted) | \$0.00 | (\$1.42) | (\$0.20) | (\$0.25) | (\$0.39) | (\$0.37) | (\$1.25) | (\$1.38) | (\$1.48) | (\$1.54) | \$1.11 | \$3.87 | \$6.89 | \$7.21 | \$7.41 |
| Diluted Shares (M) | 0.0 | 19.6 | 23.7 | 23.7 | 28.8 | 33.8 | 27.5 | 34.1 | 34.5 | 39.8 | 40.2 | 40.6 | 41.0 | 41.4 | 41.8 |
| Year-over-Year Growth | | | | | | | | | | | | | | | |
| Rhopressa | | | | | | | | | | | 430% | 80% | 44% | 30% | 15% |
| Roclatan | | | | | | | | | | | | 298% | 112% | 33% | 39% |
| Total Revenue | | | | | | | | | | | 556% | 122% | 67% | 31% | 25% |
| Gross Profit | | | | | | | | | | | 556% | 122% | 67% | 31% | 25% |
| SG&A | | | 146% | 111% | 22% | 41% | 64% | (1%) | 6% | 194% | 30% | 15% | 15% | 5% | 5% |
| R&D | | | 70% | 126% | 275% | 178% | 155% | 28% | 13% | 5% | 5% | 5% | 5% | -5% | -5% |
| Operating Income | | | | | | | | | | | | 375% | 88% | 41% | 26% |
| Net Income | | | | | | | | | | | | 253% | 80% | 6% | 4% |
| Adj. EPS | | | | | | | | | | | | 250% | 78% | 5% | 3% |

Source: Company reports and Canaccord Genuity estimates

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